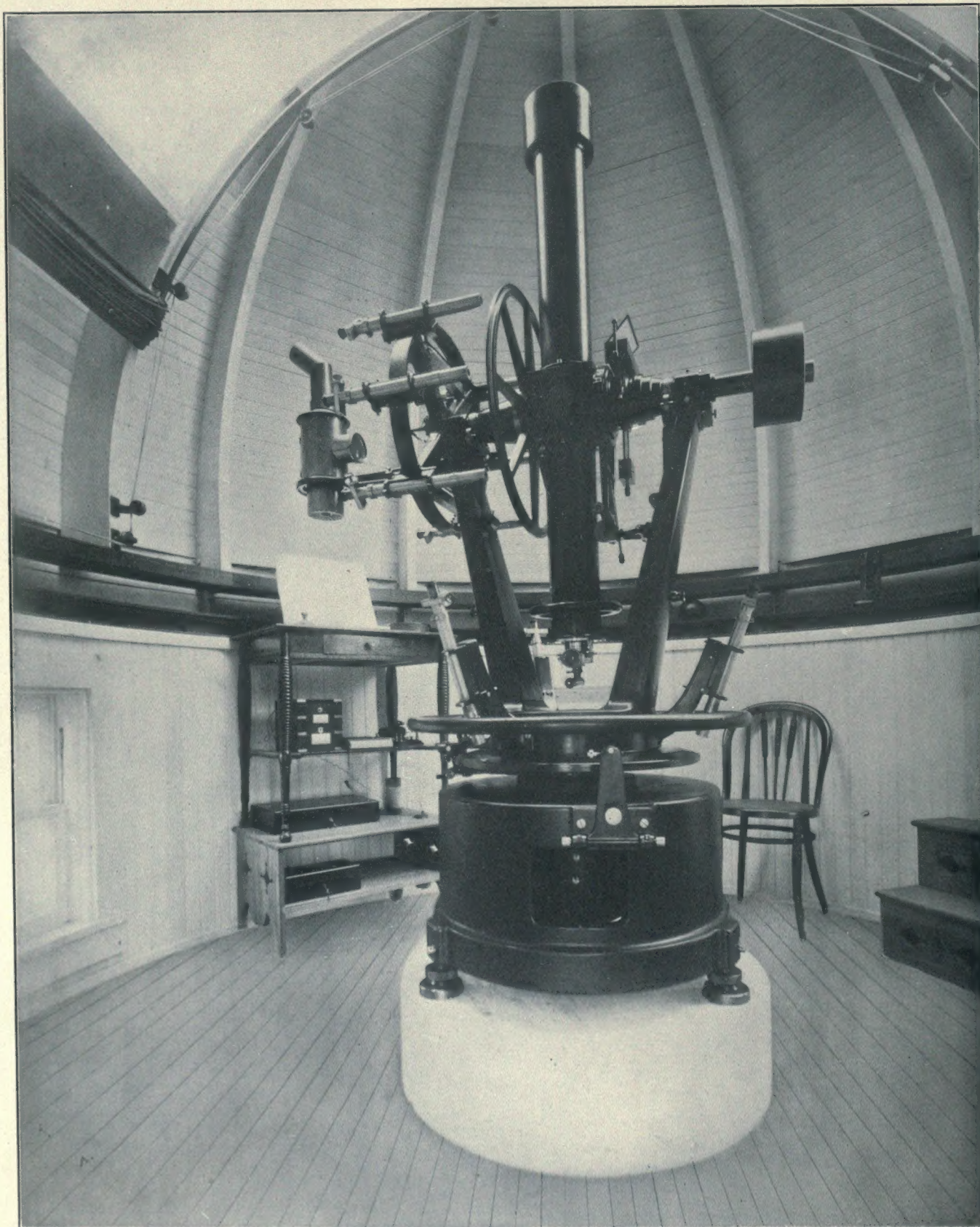


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THE 5-INCH ALT-AZIMUTH INSTRUMENT.

322
U.S.

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OF THE

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Captain J. L. JAYNE, U. S. N.

ASTRONOMICAL DEPARTMENT.

WILLIAM S. EICHELBERGER *	<i>Professor of Mathematics, U. S. N.</i>
FRANK B. LITTELL	.	.	.	.	.	.	.	.	.	<i>Professor of Mathematics, U. S. N.</i>
ASAPH HALL	.	.	.	.	.	.	.	.	.	<i>Professor of Mathematics, U. S. N.</i>
GEORGE A. HILL	.	.	.	.	.	.	.	.	.	<i>Assistant Astronomer.</i>
JOHN C. HAMMOND	.	.	.	.	.	.	.	.	.	<i>Assistant Astronomer.</i>
HERBERT R. MORGAN	.	.	.	.	.	.	.	.	.	<i>Assistant Astronomer.</i>
GEORGE H. PETERS	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
MATT FREDERICKSON	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
JAMES B. EPPES	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
ELEANOR A. LAMSON	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
HARRY E. BURTON	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
JESSE PAWLING	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
CHESTER B. WATTS	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
DAVID RINES	.	.	.	.	.	.	.	.	.	<i>Assistant.</i>
ETTA M. EATON	.	.	.	.	.	.	.	.	.	<i>Miscellaneous Computer.</i>
LEROY P. STEELE †	.	.	.	.	.	.	.	.	.	<i>Miscellaneous Computer.</i>
CHARLES CLAYTON WYLIE	.	.	.	.	.	.	.	.	.	<i>Miscellaneous Computer.</i>
JACOB SASLAW	.	.	.	.	.	.	.	.	.	<i>Miscellaneous Computer.</i>
ERNEST CLARE BOWER	.	.	.	.	.	.	.	.	.	<i>Miscellaneous Computer.</i>

* In addition to his duty as Director of the Nautical Almanac Office.

† Detailed to Department of Compasses, Chronometers, and other Nautical and Surveying Instruments.

VERTICAL CIRCLE OBSERVATIONS

MADE WITH THE

FIVE-INCH ALT-AZIMUTH INSTRUMENT,

1898-1907,

BY

F. B. LITTELL, G. A. HILL, AND H. B. EVANS,

REDUCED BY

F. B. LITTELL.

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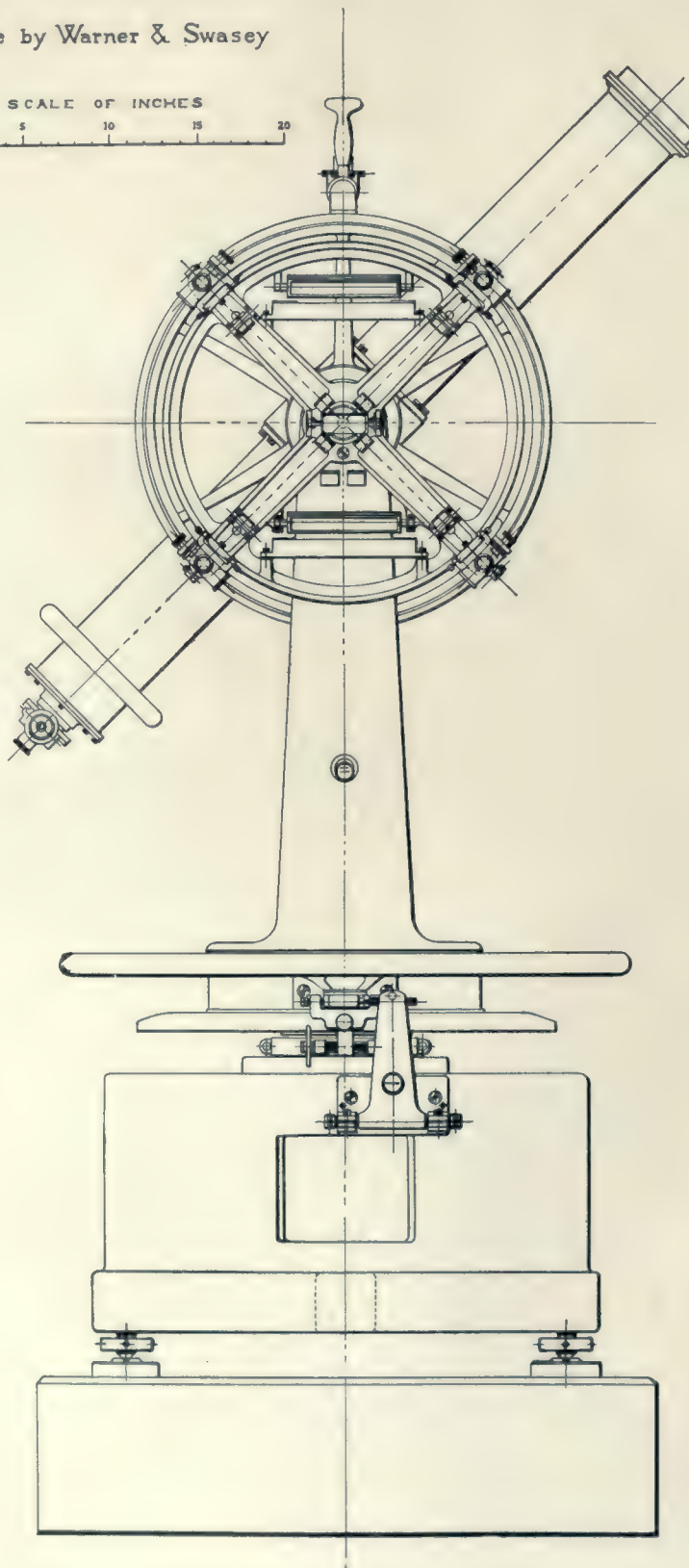
ERRATUM.

Volume VI—Second Series.

Page A 52, under Washington Mean Time, third line: For $12^h 29^m 12^s$ read $13^h 29^m 12^s$.

FIVE-INCH ALT-AZIMUTH INSTRUMENT

Made by Warner & Swasey

SCALE OF INCHES
0 5 10 15 20

INTRODUCTION.

The alt-azimuth instrument was built by WARNER & SWASEY, of Cleveland, Ohio, under the immediate supervision of Prof. WILLIAM HARKNESS, United States Navy. The instrument was completed and mounted in a small wooden house in December, 1897, and was first used in February, 1898.

This volume includes the observations made with the instrument used as a vertical circle for determining declinations from February 23, 1898, to July 13, 1907. Until November 27, 1903, the instrument was in charge of Assistant Astronomer G. A. HILL, who observed with it in addition to his duty as observer on the prime vertical transit instrument. From January 22, 1903, to July 1, 1903, he was assisted by Mr. H. B. EVANS, assistant in the Nautical Almanac Office, as a volunteer observer. After November 27, 1903, the instrument was in charge of Prof. F. B. LITTELL, United States Navy.

The alt-azimuth instrument is constructed of steel upon the same principles as the 6-inch transit circle, and the details of its circles, microscopes, and clamps are, as far as possible, identical with those of that instrument. (See Publications of the United States Naval Observatory, Second Series, Vol. III, Pt. IV, Introduction.) The objective, which is of the FRAUNHOFER type, was made by the JOHN A. BRASHEAR CO., of Allegheny, Pa. The aperture of the objective is 5.02 inches and the focal length is 50 inches. Each lens is held in place in the cell by means of a spring acting in a direction perpendicular to the meridian when the instrument is in the meridian. The horizontal axis is 25 inches long and the pivots are 1.87 inches in diameter. Spring counterpoises are provided to relieve the pivots of part of the weight of the telescope. Their action, however, has not been satisfactory, as they cause the instrument to ride up in the wyes and they have in general not been used. There is a vertical circle and a horizontal circle each 24 inches in diameter. The divisions are to 2 minutes of arc, the diameter to the divisions being 23 inches. They were on a silver strip 0.22 inch wide inlaid in the steel circle, the silver surface being inclined inward at an angle of about 5° to the plane of the circle in order to give better illumination for the microscopes. Each degree line is numbered, the numbering being clockwise around the circle. The vertical circle is read by four microscopes and the horizontal circle by three. There are two auxiliary microscopes for division error work. The microscopes with the oculars used had a magnifying power of 30 diameters. One revolution of a microscope micrometer screw is equal to 1 minute of arc, and the micrometer head is divided into 60 parts, so that each division on the head is equal to 1 second of arc.

The microscope alidade of the vertical circle carries two levels in separate boxes, one about 7 inches above and the other about 7 inches below the axis of the instru-

ment, for determining the zenith point, and the telescope is provided with two levels, side by side in a double compartment box, for use in zenith telescope observations. There is also a striding level for determining the inclination of the horizontal rotation axis. The eyepiece employed is a diagonal eyepiece giving a magnifying power of 70 diameters. Bright field illumination was provided by means of a small metallic mirror in the center of the cube which reflected upon the field light thrown into the axis by a lamp carried by the instrument. The original lamp was an oil burner, but it was soon replaced by an electric light.

The vertical rotation axis of the instrument is formed by a taper bearing 15 inches long, with ball bearings to receive the vertical thrust, and counterbalancing weights to take the greater part of the weight of the instrument. The base of the instrument is provided with three adjusting screws to adjust the vertical axis. There are adjustable stops which may be used to hold the instrument in the meridian.

The pier on which the instrument rests is of brick, 48 inches square at the bottom, resting on a concrete base 6 feet square, which extends 4 feet below the surface of the ground. The brick pier is 48 inches high and is capped by a circular block of marble 36 inches in diameter and 12 inches thick, upon which the instrument stands.

The building, which was of wood, was circular, with an outside diameter of 11 feet 10 inches. It was surmounted by a dome resting on iron balls about 6 inches in diameter. The slit was 28 inches wide and extended through an arc of 135° .

The location of the instrument is $0^{\circ}.132$ west and $2''.67$ north of the center of the clock room of the observatory.

The principal changes made in the instrument during the period covered by these observations were the installation of individual electric lights for the microscopes in December, 1904, with an arrangement to shield the circle divisions under observation from stray light, and the providing of each microscope with two sets of double threads $2\frac{1}{2}$ revolutions apart in February, 1906.

During the period from 1898 to 1903 the objects observed were mainly stars whose positions needed strengthening. From 1903 to 1907 all of NEWCOMB'S Suggested List of Fundamental Stars culminating at less than 75° zenith distance were on the list, the general program calling for 10 observations of each star in five different positions of the circle on its axis. When this program was about one-third completed, however, the condition of the circle became such from repeated cleanings that it was not deemed advisable to complete the program.

METHODS OF OBSERVING.

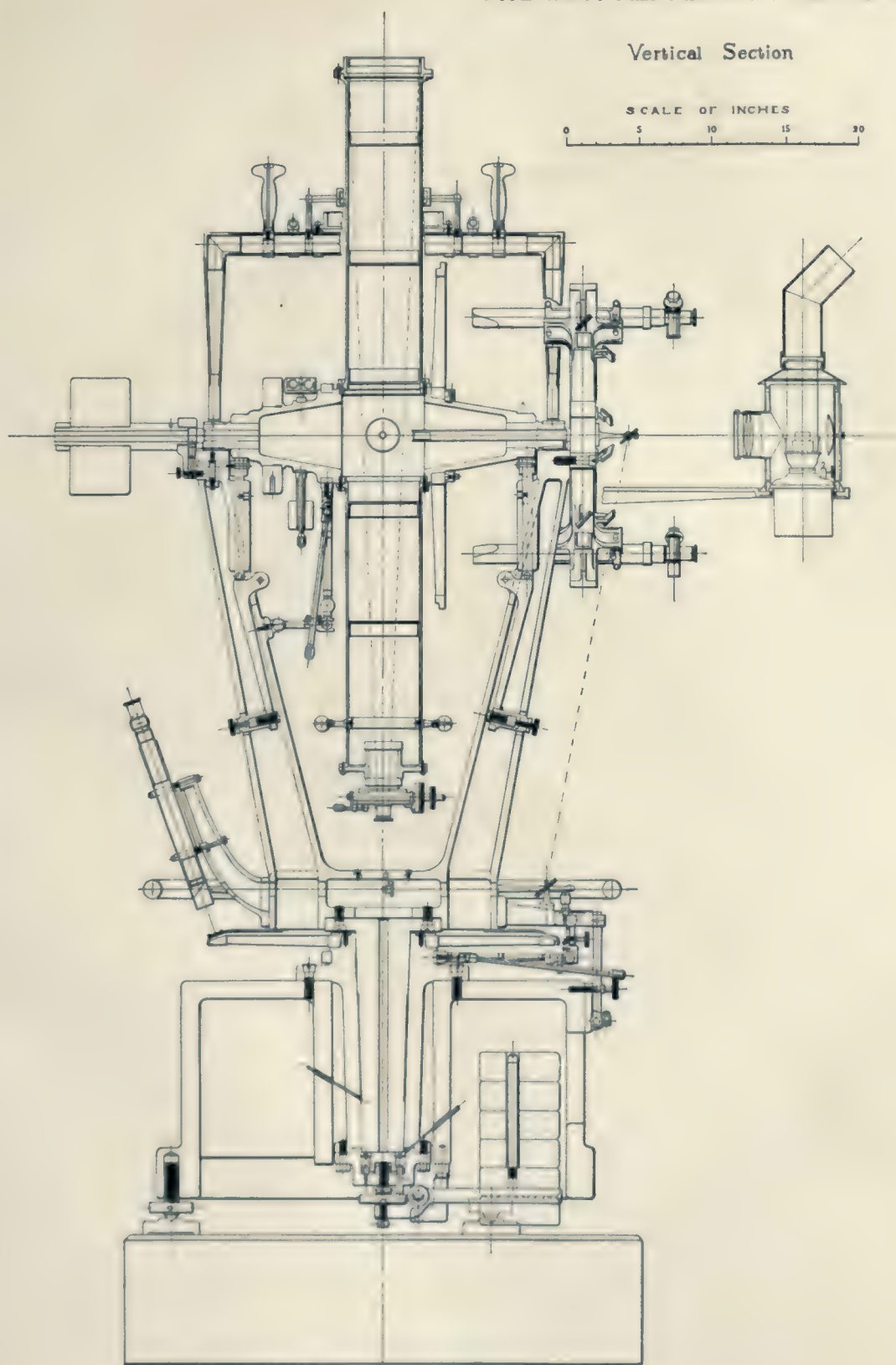
From February 23, 1898, to December 13, 1899, when observations were discontinued until May, 1902, the instrument was used practically as a quickly reversible transit circle—that is, with the instrument in the meridian an object was bisected at a side thread on the preceding side of the field by the use of the micrometer screw, the microscopes and levels having been previously read; then the instrument was reversed, reset, and the observation was repeated on the following side of the field at the same side thread. From May, 1902, to October, 1902, the instrument was used out of the meridian at small angles, the first observation being taken two or three

FIVE-INCH ALT-AZIMUTH INSTRUMENT

Vertical Section

SCALE OF INCHES

0 5 10 15 20



minutes before the time of meridian passage by a micrometer bisection at the middle of the field, noting the time to the nearest second, reading the microscopes and levels, then reversing the instrument and repeating the observation two or three minutes after the time of meridian passage. After October, 1902, in general, all observations were made similarly except that, instead of a timed micrometer bisection, there was noted the time by the eye-and-ear method when the star in its oblique course across the field crossed the fixed horizontal thread of the reticle, the observer maneuvering the instrument by means of the tangent screws when necessary, so that this transit would take place near the middle vertical or right ascension thread marking the collimation axis of the instrument. This is the method followed at Pulkowa in the vertical circle work. However, stars within 10° of the zenith were observed on a side thread by means of the zenith distance micrometer with the instrument in the meridian, with reversal. Half observations, i. e., in only one position of the instrument, have not been included. Readings were made on two consecutive divisions of the circle under each microscope, the mean only being recorded.

DOUBLE STARS.

In the case of double stars whose distances are less than 2 seconds of arc it is assumed that the center of light was observed. In the case of those whose distances are more than 5 seconds of arc the brighter was observed unless otherwise noted. Where NEWCOMB'S Catalogue indicates for what the position is given, the indication is included as part of the name. In the case of double stars whose distances are between 2 and 5 seconds of arc, the method of observing is indicated, except for the stars listed below where the differences of magnitude are considerable and the observations were probably little influenced by the presence of the fainter component, either because of the irradiation effect from the brighter component or because of the obliteration of the fainter component by the field illumination.

Name.	R. A.	Distance.	Magnitudes.
	<i>h</i> <i>m</i>	"	
γ Cassiopeiae	2 12	2.2	4.8-7.0
γ Ceti	2 38	3.0	3.7-6.2
ζ Orionis	5 36	2.6	2.0-4.2
β Lyncis	9 13	2.9	4.0-5.8
ϵ Boötis	14 47	2.5	4.8-6.8
δ Draconis	18 22	3.6	5.1-8.0
ϵ Draconis	19 49	3.1	4.0-7.6
ϕ Cygni	19 53	3.5	5.0-7.5

STATE OF THE SEEING.

The state of the seeing was frequently indicated by observer's notes. From March 25 to July 1, 1903, Mr. EVANS indicated the state of the seeing by using the numbers 1 to 5, using 1 for the best seeing. After August 15, 1904, Prof. LITTELL indicated the state of the seeing by the use of the same numbers, but in the reverse

order, so that 5 represented the best seeing. In order to harmonize these two systems the numbers recorded by Prof. LITTELL have been changed, so that in the printed observations the state of the seeing is in accordance with the following scale:

Very good seeing	= 1
Good seeing	= 2
Average seeing	= 3
Bad seeing	= 4
Very bad seeing	= 5

THERMOMETER AND BAROMETERS.

Thermometer GREEN No. 3882 was used throughout the work for determining the correction to the refraction dependent upon temperature. It was suspended about 8 feet above the floor, just within and at one side of the slit. The corrections to this thermometer, as determined by the Weather Bureau in October, 1897, have been applied to the readings. A set of corrections was also determined by the Bureau of Standards in June, 1912.

TABLE I.—*Corrections to Thermometer Green No. 3882.*

October, 1897.		June, 1912.	
Reading.	Correction.	Reading.	Correction.
0	■	0	0
- 8	0.0	0	+0.1
+ 2	+0.1		
+ 12	+0.1	+ 32	0.2
+ 22	0.0		
+ 32	0.0	+ 50	-0.2
+ 42	-0.1		
+ 52	-0.1	+ 70	-0.2
+ 62	-0.1		
+ 72	-0.2	+ 90	-0.2
+ 82	-0.1		
+ 92	-0.1	+ 110	-0.1
+ 102	-0.1		

Barometer GREEN No. 1943 was used for nearly all the work, for determining the correction to the refraction dependent upon the pressure of the atmosphere. A correction of +0.006 inch, determined by comparison with the standard barometer of the Weather Bureau in 1904, has been applied to the readings. This barometer was mounted on the inner wall of the alt-azimuth house. In some of the earlier work with the alt-azimuth instrument a barometer in the east observer's room was used.

LEVELS.

The level vials used with this instrument were made by A. PESSLER, of Freiburg, Saxony. The divisions are not etched on the tubes, but are on separate glass scales. The length of a division is 0.05 inch. The following table gives a list of level tubes used on the microscope alidade with the values of their divisions:

TABLE II.—*Values of Level Divisions.*

Upper Level.			Lower Level.		
Period used.	No.	1 Div.	Period used.	No.	1 Div.
Feb. 23, 1898, to Sept. 8, 1898 (broken)	37572	1.186	Feb. 23, 1898, to Nov. 27, 1903 . .	37574	0.961
Sept. 10, 1898, to Oct. 28, 1902 (broken) . . . . .	.....	0.924			
Oct. 28, 1902, to Nov. 27, 1903 . . .	62305	0.619			
Dec. 7, 1903, to Mar. 9, 1904	62305	0.648	Dec. 7, 1903, to Sept. 15, 1904 . . .	37574	1.002
Mar. 9, 1904, to Sept. 15, 1904 . . .	62301	0.497			
Sept. 15, 1904, to July 13, 1907 . . .	37571	1.042	Sept. 15, 1904, to July 13, 1907 . . .	37575	1.006

The somewhat different values of one division for levels No. 62305 and No. 37574 were obtained by different observers, and as the vials had been taken out of their boxes and replaced between the determinations, they may be accounted for by some relative displacement of the vials whose top side was only indicated as being opposite the inlet of the air chamber.

In the work up to September 15, 1904, there are considerable discordances between the results as deduced from the levels separately. There was a pronounced systematic difference dependent upon the size of the angle measured by the levels. This difference was mentioned in the annual report of the Superintendent for 1899, and the cause was there attributed to the action of springs holding the level boxes in place, and it was supposed to have been corrected by changes then made. However, as Table III indicates, the effect continued until September, 1904. As this difference is apparently a function of the size of the angle measured by the levels, it would seem to be due to erroneous values of the level divisions, but it is hardly possible that they could be sufficiently in error to account for the differences, and moreover the period during which this effect was observed covers several combinations of levels, and determinations of scale values independently by two different observers. After September, 1904, as shown by the table, the systematic difference was quite negligible, though still of the same sign as before. For the earlier work it was decided to reject the observations where the difference was greater than 0".6.

The following table gives, for each of the six periods indicated in the first column of TABLE II, the systematic differences between the corrections to declination as indicated by the upper and lower levels, except for the cases where the correction for level was less than 1".00 when the differences were almost entirely accidental.

TABLE III.—*Systematic Differences between the Levels.*

Corr. to Decl.	I		II		III		IV		V		VI	
	U-L	No. Obs.	U-L	No. Obs.	U-L	No. Obs.	U-L	No. Obs.	U-L	No. Obs.	U-L	No. Obs.
" "	"		"		"		"		"		"	
1 to 2	-0.01	19	+0.13	266	+0.06	292	+0.31	92	+0.26	147	+0.01	185
2 to 3	+0.15	25	+0.20	189	+0.06	60	+0.62	20	+0.62	2	+0.07	7
3 to 4	+0.35	33	+0.32	97	.....	...	+0.83	9	.....	...	+0.05	3
4 to 5	+0.35	42	+0.53	89	.....	...	.....	...	.....	...	+0.06	2
5 to 6	+0.54	27	+0.68	33	.....	...	.....	...	.....	...	.....	...
6 to 7	+0.70	7	+0.95	19	.....	...	+1.08	2	.....	...	.....	...

Besides the above-mentioned systematic differences in the levels, the accidental errors were also obtained by comparing the results from the two levels for angles less than one second of arc in the Periods I to V, and for all angles for the Period VI. From the comparison of from 500 to 800 observations in each case, it is found that the probable error due to levels affecting the declinations as determined from the mean of the two levels was $\pm 0''.06$ for the Periods I, II, and III, $\pm 0''.05$ for the Periods IV and V, and $\pm 0''.034$ for the Period VI.

CLOCK CORRECTIONS.

In the greater part of this work the hour angle of the observation was determined by noting the time of the observation, usually to the nearest second, though in the case of stars near the zenith it was sometimes possible to estimate the fraction of a second with some accuracy.

In the earlier work several different clocks and chronometers were used for this purpose, and frequent comparisons were made with the standard clock of the observatory, by means of which the clock corrections have been deduced. From January, 1903, to November, 1903, the prime vertical clock was used. After November 27, 1903, the standard clock of the observatory was used directly. Usually this was one of the RIEFLER clocks breaking circuit once in 2 seconds and operating a sounder in the alt-azimuth house by means of one of the points of a 7-point repeater. The clock corrections were obtained from the 9-inch transit circle work, being corrected for difference of longitude of the instruments and differences of personal equations of the observers. A hack chronometer was used to identify the minute. The following table gives the adopted clock corrections for each date when observations requiring a clock correction were made.

TABLE IV.—Adopted Clock Corrections.

Date.	Corr.	Date.	Corr.	Date.	Corr.	Date.	Corr.
1898	s	1899	s	1902	s	1903	s
Sept. 17.3	-35.0	May 28.9	-18.0	Oct. 15.2	+0.2 ¹	June 14.3	-2.4
19.3	-39.0	30.4	-20.0	15.7	+1.0	15.3	-2.2
23.3	-42.0	June 2.4	-26.0			18.3	-0.6
24.3	-43.0	2.9	-26.0	1903		21.3	+1.2
26.8	-44.0	3.4	-28.0	Jan. 22.3	+1.4	23.3	+1.0
27.3	-44.5	4.4	-29.0	23.3	+2.4	25.3	+1.4
28.8	-46.0	8.3	-34.0	30.3	+6.5	30.3	+3.6
29.8	-47.5	14.3	-43.0	31.3	+7.1	July 1.3	+3.7
Oct. 9.0	-35.2	15.3	-44.0	Feb. 4.3	+7.2	2.3	+4.5
9.3	-36.0	16.3	-45.0	5.3	+7.5	6.3	+3.9
11.0	-35.9	18.3	+9.0	6.3	+9.8	7.3	+4.9
12.0	-36.2	19.3	+7.0	9.3	+13.0	8.3	+5.0
12.5	-36.4	20.3	+5.0		+18.9 ²	19.3	+5.7
13.5	-36.7	23.3	0.0	12.3	+20.2	Aug. 17.3	+9.8
14.5	-37.3	24.3	-1.0	Mar. 3.3	+0.8 ³	18.4	+10.0
15.9	-37.4	Oct. 7.0	-2.0	4.3	-0.4	20.3	+9.6
16.7	-37.8	9.0	-3.0	12.3	+0.8 ⁴	21.3	+9.7
16.9	-37.9	10.0	-3.0	13.3	+4.3	23.3	+9.3
18.9	-38.5	14.0	-4.0	14.3	+5.0	24.3	+9.4
19.9	-38.9	19.0	-15.0	17.3	+6.5	Sept. 14.3	-2.0
20.5	-39.3	19.5	-10.0	18.3	+7.3	15.3	-1.9
23.4	-39.2	21.0	-19.0	19.3	+7.4	16.3	-1.9
23.9	-39.2	21.5	-17.0	25.3	+0.2	18.3	-1.9
24.4	-39.4	24.5	-27.0	26.3	+0.3	19.3	-3.7 ¹⁴
27.3	-41.8	Nov. 24.4	0.0	31.3	+4.0	20.3	-0.7
27.4	-41.9	27.4	-1.0	Apr. 1.3	+4.7	21.3	-0.4
27.9	-42.1	Dec. 2.4	-3.0	4.3	+6.8	22.3	-0.6
28.3	-42.4	12.3	-6.0	6.3	+9.1	24.3	-1.1
28.4	-42.6			10.3	+11.7 ⁵	25.3	-1.4
30.9	-43.9	1902			+13.6	26.3	-1.3 ¹⁵
31.3	-44.1	May 15.3	-5.9	17.3	+0.4	29.3	-2.1
31.4	-44.2	17.4	-6.1	18.3	+1.1 ⁶	30.3	-2.0
Nov. 1.4	-44.3	20.3	-7.3	18.6	+2.3 ⁷	Oct. 7.3	-3.0
1.9	+8.0	29.5	-10.9	21.3	+0.3 ⁸	12.3	-3.4
3.9	+2.0	30.4	-11.1	27.3	-8.7 ⁹	13.3	-3.4
6.9	-7.0	June 1.4	-11.8	27.5	-9.0 ¹⁰	14.3	-3.3
7.4	-9.0	2.4	-12.2	28.3	-10.2	18.3	-3.0
7.9	-10.0	4.4	-13.0	29.3	-12.1 ¹¹	19.3	-3.0
11.4	-22.0	5.4	-13.5	May 1.3	-17.9	20.3	-2.8
11.8	-23.0	6.3	-13.8	2.3	-20.3	21.3	-2.7
15.3	-34.0	11.4	-19.3	4.3	-26.1	31.3	0.0
		12.3	-19.5	5.3	-1.5 ¹²	Nov. 2.3	0.0
		July 2.3	-28.7	6.3	-4.6 ¹³	3.3	+0.2
		5.4	-30.4	7.3	-7.5	4.3	-0.4
		8.5	-24.8	8.3	-10.3	6.3	-0.5
		11.3	-24.5	9.3	-11.0	7.3	+0.1
		12.3	-24.3	10.3	-12.6	7.8	+0.2
		13.3	-24.4	11.3	-11.8	8.3	+0.3
		14.3	-24.3	12.3	-11.3	8.8	+0.4
		16.3	-24.4	13.3	-11.3	9.3	+0.5
		22.5	-25.0	15.3	-11.6	9.8	+0.6
		26.3	-25.4	17.3	-11.9	10.3	+0.5
		Aug. 3.4	-26.4	19.3	-12.6	10.8	+0.6
		4.3	-26.5	21.3	-11.8	12.3	+0.9
		7.3	-26.9	22.3	-12.2	14.3	+1.2
		8.3	-27.2	28.3	-9.1	Dec 7.3	+13.2 ¹⁰
		12.3	-27.4	June 2.3	-6.2	7.9	+13.3
		22.4	-27.0	3.3	-5.5	9.3	+13.7
		Oct. 7.3	-30.1	4.3	-5.3	11.3	+16.3 ¹⁷
		14.3	-28.3	8.3	-3.7	14.3	+23.3
		14.7	-28.2	9.3	-3.3		

¹ At 1st h., hourly rate = 0.41.² Clock dropped 6th at some time during the evening. Assumed to be at 0th. The error in reductions due to the uncertainty is small.³ At 1st h., hourly rate = 0.11.⁴ At 2nd h., hourly rate = 0.22.⁵ Clock dropped 2nd between 8th and 9th stars.⁶ At 3rd h., hourly rate = 0.33.⁷ At 4th h., hourly rate = 0.44.⁸ At 5th h., hourly rate = 0.55.⁹ At 6th h., hourly rate = 0.66.¹⁰ At 7th h., hourly rate = 0.77.¹¹ At 8th h., hourly rate = 0.88.¹² At 9th h., hourly rate = 0.99.¹³ At 10th h., hourly rate = 1.10.¹⁴ At 11th h., hourly rate = 1.21.¹⁵ At 12th h., hourly rate = 1.32.¹⁶ At 1st h., hourly rate = 0.41.¹⁷ At 2nd h., hourly rate = 0.82.¹⁸ Changed to RIEGLER Clock No. 20.¹⁹ After 1st h.

FIVE-INCH ALT-AZIMUTH INSTRUMENT.

TABLE IV.—Adopted Clock Corrections—Continued.

Date.	Corr.	Date.	Corr.	Date.	Corr.	Date.	Corr.
1903	<i>s</i>	1904	<i>s</i>	1904	<i>s</i>	1904	<i>s</i>
Dec. 14. 9	+23. 4	May 10. 3	+12. 1	Sept. 20. 8	- 3. 4	Nov. 21. 2	- 2. 2
15. 3	+23. 5	11. 3	+12. 2	21. 3	- 3. 5	21. 7	- 2. 3
16. 3	+23. 8	11. 7	+12. 3	21. 8	- 3. 5	23. 2	- 2. 5
30. 3	+27. 5	12. 3	+12. 4	22. 2	- 3. 4	23. 7	- 2. 6
31. 3	+27. 8	15. 7	+13. 0	23. 2	- 3. 5	26. 2	- 3. 0
	+27. 9 ¹	16. 3	+13. 1	23. 7	- 3. 5	28. 2	- 3. 2
		18. 7	+13. 4	25. 7	- 3. 6	28. 7	- 3. 3
1904		20. 3	+3. 5 ⁵	27. 3	- 3. 6	30. 2	- 3. 5 ¹⁹
Jan. 7. 3	+ 2. 2		+3. 4 ⁶	29. 3	- 3. 7		- 3. 6
14. 3	- 0. 9	21. 3	+3. 2	30. 2	- 3. 8	30. 7	3. 6
21. 2	- 0. 2	22. 7	+2. 9	Oct. 1. 2	- 3. 8	Dec. 1. 2	- 3. 7
25. 2	+ 0. 4	23. 3	+2. 7	1. 7	- 3. 8	6. 2	- 4. 3
27. 2	+ 0. 5	24. 7	+2. 4	2. 7	- 3. 9	6. 7	- 4. 4
30. 2	+ 0. 5	27. 3	+2. 0	3. 2	- 3. 9	8. 2	- 4. 6 ²⁰
Feb. 2. 3	+14. 4	28. 3	+1. 8	4. 2	- 3. 9		- 4. 7
3. 3	+14. 4		+0. 8	4. 7	- 3. 9	12. 2	- 5. 2
6. 3	+11. 0	June 3. 3	+0. 7 ⁷	5. 2	- 3. 9	13. 2	- 5. 4
11. 3	+11. 2	4. 3	+0. 6	6. 2	- 4. 0	13. 7	- 5. 4
15. 3	+11. 2	8. 3	- 0. 1	7. 2	- 4. 1	14. 2	- 5. 6
20. 3	+11. 2	10. 7	- 0. 5	7. 7	+0. 2 ¹⁴	15. 7	- 5. 8
22. 3	+11. 2		- 0. 6	8. 2	- 4. 1 ¹⁵	16. 2	- 5. 9
23. 3	+11. 2	11. 3	- 0. 7 ⁸	9. 7	- 4. 2	17. 7	- 6. 1
24. 3	+11. 2	13. 3	- 1. 0	10. 2	- 4. 2	19. 2	- 6. 4
27. 3	+11. 2	14. 3	- 1. 2	11. 3	- 4. 1 ¹⁴	20. 2	- 6. 5
Mar. 1. 3	+11. 1		- 1. 3 ⁹	13. 2	- 0. 2	20. 7	- 6. 6
2. 3	+11. 1	15. 7	- 1. 5	14. 2	- 0. 2	21. 2	- 6. 6
4. 3	+11. 0	17. 3	- 1. 9	14. 7	- 0. 2		
5. 3	+11. 1	18. 3	- 2. 1	15. 2	- 0. 3	1905	
9. 3	+11. 0	20. 6	- 2. 5	16. 7	- 0. 4	Jan. 1. 2	- 8. 5
10. 3	+11. 0	22. 3	- 2. 9	17. 2	- 0. 5	2. 2	- 8. 6
16. 3	+10. 8	22. 8	- 3. 0	17. 7	- 0. 5	4. 2	- 8. 9 ²¹
16. 7	+10. 8		- 3. 1	18. 2	- 0. 6		- 9. 0
18. 3	+10. 8	23. 3	- 3. 2 ¹⁰	18. 7	- 0. 6	8. 7	- 9. 7
22. 3	+10. 7	23. 8	- 3. 2	19. 2	- 0. 7	12. 7	- 10. 4
23. 3	+10. 6	25. 3	- 3. 5	21. 3	- 0. 9	14. 2	- 10. 7
23. 7	+10. 6	July 1. 8	- 4. 5	22. 2	- 0. 9	15. 3	- 10. 9
24. 3	+10. 7	2. 3	- 4. 4	22. 7	- 1. 0	16. 2	- 11. 0 ²²
25. 3	+10. 6		- 4. 3 ¹¹	23. 7	- 1. 1		- 11. 1
28. 7	+10. 6	3. 8	- 4. 0	24. 2	- 1. 1	16. 7	- 11. 1
29. 3	+10. 6	6. 8	- 2. 8	24. 7	- 1. 2	18. 2	- 11. 4
Apr. 1. 3	+10. 5	7. 8	- 2. 8	25. 2	- 1. 3	18. 7	- 11. 5
2. 3	+10. 5	10. 7	- 2. 8	27. 2	- 1. 5	19. 7	- 11. 7
4. 3	+10. 6	11. 3	- 2. 7	27. 7	- 1. 5	20. 2	- 11. 7
5. 3	+10. 6	12. 8	- 2. 6	28. 2	- 1. 6		- 11. 8 ²³
9. 3	+10. 7	13. 3	- 2. 6	28. 7	- 1. 6	22. 7	- 12. 2 ²⁴
11. 3	+10. 7	Aug. 6. 3	+0. 8 ¹²	29. 3	- 1. 7		- 12. 3
14. 3	+10. 6	11. 3	+0. 3	30. 7	- 1. 8	23. 2	- 12. 3
16. 3	+10. 7	12. 3	+0. 2	31. 3	- 1. 8	27. 2	- 13. 1
17. 7	+10. 7	15. 3	- 0. 1	Nov. 1. 2	- 1. 9	28. 7	- 13. 4
18. 3	+10. 8	16. 3	- 0. 2	1. 7	- 2. 0	30. 2	- 13. 7
20. 3	+10. 8	17. 3	- 0. 3	2. 2	- 2. 0	Feb. 4. 2	- 14. 3
21. 7	+10. 8	23. 3	- 1. 0		- 2. 1 ¹⁶	6. 7	- 14. 4
30. 3	+11. 0	24. 3	- 1. 1	5. 7	- 2. 5	7. 2	- 14. 4
May 1. 7	+11. 0	25. 3	- 1. 2	6. 7	- 2. 5 ¹⁷	10. 2	- 14. 4
	+11. 1 ²	Sept. 2. 3	- 2. 1	7. 2	- 2. 6	11. 2	- 14. 3
2. 3	+11. 1	3. 2	- 2. 2	11. 2	- 2. 9	14. 2	- 14. 4
3. 7	+11. 2 ³	5. 3	- 2. 4	14. 2	- 1. 2	15. 7	- 14. 5
4. 3	+11. 3	7. 3	- 2. 6	16. 2	- 1. 5	17. 2	- 14. 5
	+11. 4 ⁴		- 2. 7 ¹³	16. 7	- 1. 6	17. 7	- 14. 5
5. 7	+11. 4	15. 3	- 3. 3		- 1. 6 ¹⁸	18. 2	- 14. 5
7. 3	+11. 6	16. 3	- 3. 3	17. 2	- 1. 7	23. 7	- 14. 6
9. 7	+12. 0	20. 3	- 3. 4	19. 2	- 1. 9	24. 2	- 14. 7
						26. 2	- 14. 7

¹ After 1^h 0.

² After 1^h 1.

³ After 1^h 6.

⁴ After 1^h 0.

⁵ Changed to RIEFLER Clock No. 60.

⁶ After 1^h 3.

⁷ After 1^h 7.

⁸ After 1^h 0.

⁹ After 1^h 0.

¹⁰ After 1^h 0.

¹¹ After 1^h 8.

¹² Changed to RIEFLER Clock No. 82.

¹³ After 1^h 8.

¹⁴ Changed to RIEFLER Clock No. 70.

¹⁵ Changed to RIEFLER Clock No. 82.

¹⁶ After 2^h 9.

¹⁷ After 0^h 1.

¹⁸ After 2^h 4.

¹⁹ After 0^h 3.

²⁰ After 0^h 0.

²¹ After 2^h 4.

²² After 3^h 0.

²³ After 1^h 4.

²⁴ After 1^h 0.

TABLE IV.—Adopted Clock Corrections—Continued.

Date.	Corr.	Date.	Corr.	Date.	Corr.	Date.	Corr.
1905	s	1905	s	1906	s	1906	s
Feb. 20.7	-14.7	Dec. 4.8	+11.0	Apr. 4.3	+0.5	Sept. 29.3	+2.1
28.2	-14.8	5.2	+11.7	6.3	+0.9	Oct. 6.2	+1.2
Mar. 2.2	-14.8	5.8	+11.7	7.3	+1.1	7.2	+1.1
2.7	-14.9	6.2	+11.7	12.3	+2.3	7.7	+1.1 ⁸
6.2	-14.9	6.8	+11.8	13.3	+2.6	8.3	+1.0 ⁸
10.3	-14.9	7.2	+11.8	16.3	+8.0 ⁶	9.7	+1.0 ⁸
10.7	-14.9	10.8	+11.9 ²	18.3	+7.8	11.2	+0.7
11.2	-15.0	11.2	+12.2	19.3	+7.8	11.7	+0.6
12.2	-15.0	12.2	+12.2	24.3	+7.6	12.2	+0.6
12.7	-15.0	13.2	+12.3	28.3	+7.4	12.7	+0.5
13.2	-14.9	18.2	+12.4	May 2.3	+7.1	15.3	+0.1
15.2	-14.9	19.3	+12.8	4.3	+7.0	23.3	+0.8 ⁹
16.2	-14.9	21.3	+13.1	4.9	+7.0	26.2	-1.2
18.2	-14.9	21.8	+13.1	8.3	+6.8	29.2	-1.7
23.2	-14.9	29.8	+14.1	12.3	+6.7	29.7	-1.7
25.3	-14.9	30.3	+14.1	16.3	+6.5	30.2	-1.8
27.3	-14.9			18.3	+6.4	Nov. 1.2	-2.2
28.3	-15.0			18.9	+6.4	1.7	-2.2
29.2	-15.0	1906		21.3	+6.3	2.2	-2.2
31.3	-14.9	Jan. 1.8	+14.4	22.9	+6.3	2.7	-2.2 ¹⁰
Apr. 3.3	-14.9	5.3	+14.8	23.4	+6.3	3.2	-2.3
6.4	-15.0	6.3	+14.9	23.9	+6.2	4.2	-2.4
7.3	-14.8	9.8	+15.3	24.3	+6.2	4.7	-2.4
9.3	-14.9	10.3	+15.4	25.3	+6.0	5.2	-2.5
16.3	-14.8	16.2	+28.1	29.4	+6.0	5.7	-2.5
17.3	-14.8	16.7	+28.1	29.9	+6.0	6.2	-2.6
18.3	-14.8	18.2	+28.3 ³	30.9	+5.9	7.3	-2.7
20.6	-14.8	18.7	-4.7	June 2.3	+5.8	8.3	-2.8
24.6	-14.7	24.2	-4.6	4.3	+5.7	9.3	-2.8
30.6	-14.6	24.7	-4.6	7.3	+5.5	10.3	-2.8
May 2.4	-14.6	28.3	-4.7	11.3	+5.1	12.3	-2.9
7.5	-14.6	29.2	-4.7	20.3	+4.9	13.3	-2.9
8.3	-14.6	29.7	-4.7	25.3	+4.9	16.3	-3.3
9.9	-14.6	30.2	-4.7	26.8	+4.8	16.7	-3.3
12.3	-14.6	Feb. 9.2	-4.6	28.8	+4.8	21.3	-3.4 ¹¹
12.9	-14.6	13.2	-4.5	29.3	+4.8	22.3	-3.5
18.3	-14.5	14.7	-4.4	30.3	+4.8	22.7	-3.5
19.3	-14.5	15.2	-4.4	July 2.3	+4.7	23.3	-3.6
19.9	-14.5	16.3	-4.4	5.3	+4.6	26.3	-3.7
20.3	-14.5	17.2	-4.3	7.3	+4.5	28.3	-3.8
21.9	-14.5	20.2	-4.2	9.3	+4.5	29.2	-3.8
22.3	-14.5	22.2	-4.0	12.3	+4.4	29.7	-3.8
22.9	-14.5	22.7	-4.0	13.3	+4.3	Dec. 1.3	-3.9
23.9	-14.5	23.2	-2.0	18.3	+4.1	2.3	-4.0
24.3	-14.5	23.7	-1.9	19.3	+4.0	3.7	-4.0
June 1.3	-14.5	24.2	-1.9	25.3	+4.0	4.3	-4.1
2.3	-14.4	25.7	-1.8 ⁵	26.3	+3.9	7.3	-4.1
3.3	-14.4	26.2	-1.8	28.3	+3.7	11.3	-4.2
5.4	-14.4	28.2	-1.6	Aug. 4.3	+3.7	12.3	-4.2
5.9	-14.4	Mar. 1.7	-3.5	6.3	+3.7	18.3	-4.4
8.3	-14.3	2.3	-3.6	15.3	+3.7	18.7	-4.4
8.9	-14.3	5.2	-3.4	16.3	+3.7	23.2	-4.3
9.3	-14.3	6.2	-3.3	22.3	+3.7	24.3	-4.3
9.9	-14.3	10.2	-3.0	Sept. 4.3	+3.4	25.3	-4.4
12.9	-14.3	17.2	-2.3	5.3	+3.4	26.3	-4.5
13.3	-14.3	18.2	-2.2	6.3	+3.2	26.7	-4.5
14.3	-14.3	19.7	-2.1	7.3	+3.0		
15.3	-14.2	20.7	-2.0	11.3	+3.0		
17.3	-14.1	21.3	-1.9	12.3	+3.0		
21.4	-13.9	22.3	-1.8	14.3	+2.8		
25.3	-13.6	22.7	-1.8	18.3	+2.7	1907	
26.3	-13.6	23.3	-1.6	19.3	+2.6	Jan. 20.2	-3.9
27.3	-13.5	Apr. 1.3	+0.2	21.3	+2.5	21.2	-3.8
Dec 1.2	+11.4	2.3	+0.1	24.3	+2.5	22.7	-3.8
4.2	+11.6 ¹	3.3	+0.3	24.7	+2.5	23.2	-3.8
				25.3	+2.5	26.2	-3.6

¹ After 21^h 2.² After 21^h 2.³ Changed to RICHMOND Clock No. 32.⁴ After 5^h 3.⁵ After 16^h 8.⁶ Changed to RICHMOND Clock No. 70.⁷ After 16^h 2.⁸ After 6^h 2.⁹ After 21^h 7.¹⁰ After 21^h 4.¹¹ After 6^h 4.

TABLE IV.—*Adopted Clock Corrections—Continued.*

Date.	Corr.	Date.	Corr.	Date.	Corr.	Date.	Corr.
1907	s	1907	s	1907	s	1907	s
Jan. 28.2	— 3.4	Feb. 25.2	— 1.0	Mar. 28.3	+ 2.8	May 20.3	+ 9.7
30.7	— 3.3	25.7	— 0.9	29.3	+ 2.9	23.3	+ 10.1
Feb. 5.2	— 2.9	27.2	— 0.7	29.7	+ 3.0	June 3.3	+ 12.6
6.3	— 3.0	Mar. 2.3	— 0.4	Apr. 1.3	+ 3.3	5.3	+ 12.3
7.2	— 2.9	4.3	— 0.1	3.3	+ 3.5	6.3	+ 12.3
8.2	— 2.8	5.3	0.0	9.3	+ 4.3	8.3	+ 12.2
8.7	— 2.8	6.3	+ 0.1	11.3	+ 4.6	15.3	+ 11.9
9.2	— 2.7	6.7	+ 0.2	12.3	+ 4.7	17.3	+ 11.8
10.2	— 2.6	8.7	+ 0.4	15.3	+ 5.2	20.3	+ 11.7
11.2	— 2.5	9.3	+ 0.4	17.3	+ 5.5	21.3	+ 11.7
12.2	— 2.4	11.3	+ 0.6 ¹	24.3	+ 6.5	24.3	+ 11.4
13.2	— 2.3	15.3	+ 0.7	27.3	+ 6.9	26.3	+ 11.2
13.7	— 2.3	15.7	+ 1.1	29.3	+ 7.3	27.3	+ 11.2
14.2	— 2.2	16.3	+ 1.2	May 4.3	+ 7.8	July 1.3	+ 10.8
15.2	— 2.1	18.3	+ 1.3	9.3	+ 8.6	3.3	+ 10.7
15.7	— 2.1	19.7	+ 1.4	11.3	+ 8.7 ³	6.3	+ 10.4
16.2	— 2.0	20.3	+ 1.6	13.3	+ 8.9	8.3	+ 10.3
18.2	— 1.8	22.3	+ 1.7 ²	14.3	+ 9.1	9.4	+ 10.2
21.2	— 1.4	26.7	+ 1.9	17.3	+ 9.2	11.4	+ 10.1
22.2	— 1.3				+ 9.4	12.4	+ 10.0
23.2	— 1.2				+ 9.5 ⁴	13.4	+ 10.0

¹ After 7^h.2.² After 8^h.5.³ After 11^h.7.⁴ After 13^h.4.

THE ZENITH DISTANCE MICROMETER.

The zenith distance micrometer was used to make the bisections in nearly all the observations up to October, 1902. After that time the micrometer was used but little except in observing stars near the zenith, and after February, 1904, it was used for such observations practically as a fixed thread; that is, the star was bisected by means of the micrometer for the first half of the observation, but on reversal the tangent screw was used to make the bisection with the micrometer thread but without disturbing the micrometer.

After January, 1904, the coincidence of the movable zenith distance thread with the fixed thread was measured occasionally. The following are the adopted values of this coincidence.

TABLE V.—*Coincidences of Movable and Fixed Zenith Distance Threads.*

Period.	Coinci- dence.	Period.	Coinci- dence.
	rev.		rev.
Jan. 27, 1904.	24.773	May 12, 1906, to June 7, 1906.	24.910
Feb. 20, 1904, to Apr. 20, 1904.	24.846	June 11, 1906, to July 9, 1906.	24.905
Apr. 30, 1904, to Aug. 12, 1904.	24.850	July 12, 1906, to Aug. 6, 1906.	24.900
Aug. 15, 1904, to Dec. 21, 1904.	24.860	Aug. 15, 1906, to Sept. 7, 1906.	24.895
Jan. 1, 1905, to Mar. 31, 1905.	24.870	Sept. 11, 1906, to Oct. 12, 1906.	24.890
Apr. 3, 1905, to June 5, 1905.	24.872	Oct. 15, 1906, to Nov. 13, 1906.	24.885
June 13, 1905, to June 27, 1905.	24.932	Nov. 16, 1906, to Apr. 3, 1907.	24.880
Dec. 1, 1905, to Mar. 10, 1906.	24.920	Apr. 9, 1907, to July 13, 1907.	24.870
Mar. 17, 1906, to May 8, 1906.	24.915		

This data is not necessary for obtaining the observed declinations. It has been used in the reductions of the stars observed with the movable thread in order to bring the zenith points derived from these observations and the zenith points derived from the observations with the fixed thread to a common basis.

The value of 1 revolution of the micrometer screw, as deduced by Mr. HILL from measurements of stars of the Pleiades, and from measurements on circumpolar stars at elongation was $40''.839 \pm 0''.007$. In 1906, Prof. LITTELL redetermined the value from measurements on Polaris at eastern and western elongations. The latter value, $40''.836 \pm 0''.012$, which did not differ materially from the former, has been used in the reductions.

In 1911, the micrometer was examined by Assistant Astronomer H. R. MORGAN by means of the STACKPOLE comparator with a view to measuring its periodic and progressive errors. With the high magnifying power there used it was immediately found that there was an irregularity in the motion of the micrometer plate amounting to approximately $1''.2$, and depending upon the pressure of the hand on the micrometer head at right angles to the direction of motion of the plate. The cause of this proved to be a looseness of the bearing head in its cup. The trouble has since been entirely eliminated by the makers, who have furnished a new screw with bearing head of improved design. It is very probable that this condition had existed for a long time, and that it has increased the accidental errors of the observations made with the use of the zenith distance screw except those mentioned above in which the micrometer was not touched for the second bisection. A small sine error with a coefficient of approximately $0''.08$ was indicated by the measures, but on account of the looseness of the bearing this could not be determined with precision.

The micrometer plate carries five threads for measurements of zenith distances, their intervals, as determined in 1899, being as follows:

TABLE VI. — *Zenith Distance Micrometer Threads.*

Thread.	Interval.
	rev.
A	+19.971
B	+ 9.886
C	0.000
D	9.996
E	-20.002

Thread A is the one nearest the micrometer head. Thread C is the one usually used in observing with the micrometer. The correction to this thread for inclination as determined from star observations was $+0''.73$ at right ascension Thread I, and $-0''.73$ at right ascension Thread IX, signs applicable to circle readings.

THE MICROSCOPE MICROMETER SCREWS.

The microscope micrometer screws were measured on the STACKPOLE comparator in 1911 by Messrs. MORGAN and PAWLING and the following coefficients of the errors of the form $\sin \theta$ were found for the four micrometers used in this work: A, $0''.04$; B, $0''.30$; L, $0''.13$; and D, $0''.06$. After February, 1906, when the extra pair of threads was installed in each microscope at a distance of $2\frac{1}{2}$ revolutions from the other pair, the above errors were immediately eliminated by the method of observing. The coefficients of the errors of the form $\sin 2\theta$ were: A, $0''.01$; B, $0''.12$; L, $0''.02$; and D, $0''.02$.

ERRORS OF RUNS.

In the earlier work corrections for errors of runs were in general unnecessary, as the microscopes were usually kept at nearly constant readings. From January 22, 1903, to May 19, 1903, the runs were measured over 4-minute spaces at the beginning and end of each night's work, and from May 25, 1903, to November 14, 1903, they were measured over 2-minute spaces at the beginning and end of each night's work. After December 7, 1903, they were measured over the 20-minute spaces corresponding to the setting $0^\circ 0'$, for a time usually once each night, but after experience had demonstrated the stability of the microscopes the frequency of this observation was diminished. The readings over the 20-minute spaces employed were corrected in accordance with the results of comparisons of each space with 46 other similar spaces on the circle.

The adopted corrections for runs are given in the following table. The values followed by an asterisk are interpolated.

TABLE VII.—*Adopted Corrections for Runs of Microscopes.*

Date.	Corr. for $1'$.	Date.	Corr. for $1'$.	Date.	Corr. for $1'$.	Date.	Corr. for $1'$.
1903	"	1903	"	1903	"	1903	"
Jan. 22.3	+0.40	Mar. 14.3	-0.26	Apr. 18.6	+0.16	May 7.4	-0.03
23.3	+0.42	17.3	-0.29	21.3	-0.26	8.3	-0.23
30.3	+0.44	18.3	-0.14	27.3	-0.14	9.3	-0.10
31.3	+0.42	19.3	-0.26	27.5	-0.16	10.3	-0.22
Feb. 4.3	+0.30	25.3	-0.19	28.2	-0.22	11.3	-0.12
5.3	-0.20	26.3	-0.13	29.3	-0.30	12.3	-0.31
6.3	-0.20	31.3	-0.26	29.5	-0.09	12.5	-0.08
9.3	-0.25	Apr. 1.3	-0.16	May 1.3	-0.14	13.3	-0.31
12.3	-0.18	4.3	-0.20	2.3	+0.02	15.3	-0.20
Mar. 3.3	-0.30	6.3	-0.27	4.3	-0.27	17.3	-0.18
4.3	-0.33	10.3	-0.08	5.3	-0.04	19.3	-0.20
12.3	-0.28	17.3	-0.06	5.5	-0.18	21.3	-0.28
13.3	-0.23	18.3	-0.13	6.3	-0.12	21.5	-0.06

TABLE VII.—Adopted Corrections for Runs of Microscopes—Continued.

Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.
1903	"	1903	"	1904	"	1904	"
May		Nov.		May		Sept.	
22.3	-0.26	14.3	+0.14	4.3	+0.05	21.8	+0.06*
28.3	-0.02	Dec.		5.7	-0.03	22.2	+0.06*
28.4	-0.08	7.3	+0.02	7.3	+0.04	23.2	+0.06
June		7.9	+0.03*	9.7	+0.04	23.7	+0.06*
2.3	-0.31	9.3	+0.03*	10.3	+0.05	25.7	+0.05*
3.3	-0.24	11.3	+0.06	11.3	+0.04	27.3	+0.04*
4.3	-0.12	14.3	+0.04	11.7	+0.04	29.3	+0.04
8.3	-0.20	14.9	+0.03*	12.3	+0.05	30.2	+0.04*
9.3	-0.03	15.3	+0.02	15.7	+0.04	Oct.	
14.3	-0.02	16.3	+0.02	16.3	+0.06	1.2	+0.04*
15.3	-0.06	30.3	+0.02	18.7	+0.02	1.7	+0.04*
18.3	-0.21	31.3	+0.03	20.3	+0.06	2.7	+0.05*
21.3	-0.08			21.3	+0.06	3.2	+0.05
23.3	-0.02	1904		22.7	+0.04	4.2	+0.06*
25.3	-0.21	Jan.		23.3	+0.05	4.7	+0.06*
30.3	-0.18	7.3	+0.02	24.7	+0.05	5.2	+0.06*
July		14.3	+0.03	27.3	+0.06	6.2	+0.06
1.3	-0.02	21.2	+0.03	28.3	+0.04	7.2	+0.06*
2.3	+0.02	25.2	+0.02	June		7.7	+0.06*
6.3	-0.13	27.2	+0.02	3.3	+0.05	8.2	+0.06*
7.3	-0.03	30.2	+0.02	4.3	+0.05	9.7	+0.06*
8.3	-0.06	Feb.		8.3	+0.04	10.2	+0.06*
10.3	-0.12	2.3	+0.03	10.7	+0.03	11.3	+0.06
17.3	-0.11	3.3	+0.05*	11.3	+0.03	13.2	+0.06*
18.4	-0.04	4.2	+0.06	13.3	+0.04	14.2	+0.06
20.3	+0.02	6.3	+0.03	14.3	+0.04	14.7	+0.06*
21.3	-0.10	11.3	+0.02	15.7	+0.04	15.2	+0.06*
23.3	-0.05	15.3	+0.01	17.3	+0.05	16.7	+0.06*
24.3	-0.06	20.3	+0.03	18.3	+0.05	17.2	+0.06
Sept.		22.3	+0.03	20.6	+0.04	17.7	+0.06*
14.3	+0.50	23.3	+0.03	22.3	+0.05	18.2	+0.06*
15.3	+0.20	24.3	+0.06	22.8	+0.06	18.7	+0.06*
16.3	+0.33	27.3	+0.04	23.3	+0.06	19.2	+0.06*
18.3	+0.14	Mar.		23.8	+0.04	21.3	+0.06
19.3	-0.09	1.3	+0.05	25.3	+0.03	22.2	+0.06
20.3	-0.22	2.3	+0.04	July		22.7	+0.06*
21.3	+0.24	4.3	+0.05	1.8	+0.03*	23.7	+0.06*
22.3	-0.16	5.3	+0.03	2.3	+0.03	24.2	+0.06*
24.3	+0.09	9.3	+0.03	3.8	+0.03*	24.7	+0.06*
25.3	+0.43	10.3	+0.01	6.8	+0.04*	25.2	+0.06*
26.3	+0.13	16.3	+0.05	7.8	+0.04*	27.2	+0.05
29.3	+0.06	16.7	+0.05*	10.7	+0.06	27.7	+0.05*
30.3	-0.21	18.3	+0.04*	11.3	+0.05	28.2	+0.05*
Oct.		22.3	+0.01	12.8	+0.05*	28.7	+0.05*
7.3	-0.18	23.3	+0.03	13.3	+0.06	29.3	+0.05*
12.3	+0.40	23.7	+0.04*	Aug.		30.7	+0.05*
13.3	+0.43	24.3	+0.05	6.3	+0.07	31.3	+0.05
14.3	+0.36	25.3	+0.04	11.3	+0.06	Nov.	
18.3	+0.40	28.7	+0.02*	12.3	+0.07	1.2	+0.04*
19.3	-0.27	29.3	+0.01	15.3	+0.06	1.7	+0.04*
20.3	-0.41	Apr.		16.3	+0.06	2.2	+0.04*
21.3	-0.34	1.3	+0.03	17.3	+0.06	5.7	+0.03*
21.3	-0.29	2.3	+0.04	23.3	+0.06	6.7	+0.03*
Nov.		4.3	+0.04	24.3	+0.04	7.2	+0.03
2.3	-0.31	5.3	+0.06	25.3	+0.05	11.2	+0.02
3.3	-0.26	9.3	+0.05	Sept.		14.2	+0.02
4.3	+0.24	11.3	+0.05	2.3	-0.06	16.2	+0.03
6.3	+0.24	14.3	+0.04	3.2	+0.05	16.7	+0.03*
7.3	-0.18	16.3	+0.04	5.3	+0.05*	17.2	+0.02
7.8	-0.10	17.7	+0.04	7.3	+0.04	19.2	+0.03
8.3	-0.22	18.3	+0.05	15.3	+0.04	21.2	+0.02
8.8	-0.09	20.3	+0.02	16.3	+0.04	21.7	+0.02*
9.3	-0.23	21.7	+0.02	16.8	+0.05*	23.2	+0.03
9.8	-0.06	30.3	+0.04	20.3	+0.07	23.7	+0.02*
10.3	-0.18	May		20.8	+0.06*		
10.8	-0.22	1.7	+0.03	21.3	+0.06		
12.3	-0.16	2.3	+0.06				
		3.7	+0.04				

* Interpolated value.

TABLE VII.—Adopted Corrections for Runs of Microscopes—Continued.

Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.
1904	"	1905	"	1905	"	1906	"
Nov. 26.2	+0.01	Mar. 13.2	0.00*	Dec. 7.2	0.00	Apr. 12.3	+0.06
28.2	0.00*	15.2	+0.01*	10.8	+0.01*	13.3	+0.06
28.7	0.00*	16.2	+0.02	11.2	+0.01	16.3	+0.05
30.2	0.00	18.2	+0.01*	12.2	0.00	18.3	+0.06
30.7	+0.01*	23.3	0.00	13.2	+0.03	19.3	+0.07
Dec. 1.2	+0.02	25.3	+0.01	18.2	+0.04	24.3	+0.04
6.2	+0.03*	27.3	+0.02	19.3	+0.05	28.3	+0.06
6.7	+0.03*	28.3	+0.02	21.3	+0.01	May 2.3	+0.05
8.2	+0.03	29.2	+0.01*	21.8	+0.01*	4.3	+0.07
12.2	+0.02	31.3	+0.01*	29.8	+0.02*	4.9	+0.06*
13.2	+0.03	Apr. 3.3	0.00	30.3	+0.02	8.3	+0.05
13.7	+0.03*	6.4	-0.01*			12.3	+0.05
14.2	+0.04	7.3	-0.01	1906		16.3	+0.05
15.7	+0.02*	9.3	-0.01	Jan. 1.8	+0.02*	18.3	+0.04
16.2	+0.02	13.3	0.00*	5.3	+0.02	18.9	+0.04*
17.7	+0.02*	16.3	0.00	6.3	+0.02	21.3	+0.03
19.2	+0.02*	17.3	0.00	9.8	+0.02*	22.9	+0.05*
20.2	+0.02	18.3	+0.02	10.3	+0.02	23.4	+0.05*
20.7	+0.01*	19.3	+0.01*	16.2	+0.02	23.9	+0.06*
21.2	+0.01	20.6	0.00	16.7	+0.02*	24.3	+0.06
		24.6	+0.01	18.2	+0.02	25.3	+0.05
		30.6	+0.01	18.7	+0.03*	29.4	+0.04*
1905		May 2.4	+0.03	24.2	+0.04	29.9	+0.04*
Jan. 1.2	+0.03	7.5	-0.01	24.7	+0.04*	30.9	+0.04*
2.2	+0.01	8.3	+0.01	28.2	+0.05	June 2.3	+0.04
4.2	0.00	9.9	+0.01*	29.2	+0.04	4.3	+0.05
8.7	0.00*	12.3	+0.01	29.7	+0.04*	7.3	+0.05
12.7	0.00	12.9	+0.01*	30.2	+0.04*	11.3	+0.06
14.2	0.00*	18.3	0.00	Feb. 9.2	+0.01	11.3	+0.06
15.3	0.00	19.3	+0.01	13.2	-0.01	20.3	+0.05*
16.2	0.00	19.9	+0.01*	14.7	0.00*	25.3	+0.04
16.7	0.00*	20.3	+0.01	15.2	+0.01	26.8	+0.04*
18.2	+0.02	21.9	+0.02*	16.2	+0.01	28.8	+0.05*
18.7	+0.01*	22.3	+0.02	17.2	-0.01	29.3	+0.05
19.7	0.00	22.9	+0.02*	19.2	-0.01	30.3	+0.05
20.2	-0.01	23.9	+0.01	20.2	-0.02	July 2.3	+0.05*
22.7	-0.01*	24.3	+0.01	22.2	-0.01	5.3	+0.04
23.2	-0.01	June 1.3	+0.02	22.7	-0.01*	7.3	+0.06
27.2	-0.01	2.3	0.00	23.2	+0.03	9.3	+0.03
28.7	-0.01*	2.9	+0.01*	23.7	+0.04*	12.3	+0.03
30.2	-0.01	3.3	+0.02	24.2	+0.04	13.3	+0.03*
Feb. 4.2	-0.01	5.4	+0.04	25.7	+0.02*	18.3	+0.03
6.7	-0.01*	5.0	+0.04*	26.2	+0.01	19.3	+0.05
7.2	-0.01*	8.3	0.00	28.2	0.00	25.3	+0.04
10.2	-0.01*	8.9	+0.01*	Mar. 1.7	+0.03	26.3	+0.05
11.2	-0.01	9.3	+0.02	2.3	+0.05	28.3	+0.06
14.2	+0.01	9.9	+0.02*	5.2	+0.03	Aug. 4.3	+0.05
15.7	0.00*	12.9	+0.01*	6.2	+0.06	6.3	+0.04
17.2	-0.02	13.3	+0.01	10.2	+0.05	15.3	+0.04
17.7	-0.01*	14.3	+0.02	17.2	+0.05	16.3	+0.02
18.2	0.00	15.3	+0.02	18.2	+0.05*	22.3	+0.03*
23.7	-0.01	17.3	+0.03	19.7	+0.05*	23.3	+0.03
24.2	0.00*	21.4	+0.02	20.7	+0.05	Sept. 4.3	+0.01
26.2	+0.01	25.3	+0.03	21.3	+0.03	5.3	+0.02
26.7	0.00*	26.3	+0.03	22.3	+0.04	6.3	+0.01
28.2	0.00	27.3	+0.03*	22.7	+0.04*	7.3	+0.02
Mar. 2.2	0.00	Dec. 1.2	-0.01	23.3	+0.03	11.3	+0.02
2.7	0.00*	4.2	-0.01	Apr. 1.3	+0.06	12.3	+0.03
6.2	-0.01	4.6	-0.01*	2.3	+0.06	14.3	+0.02
10.3	-0.01*	5.2	-0.01	3.3	+0.06	18.3	+0.03
10.7	-0.01*	5.8	-0.01*	4.3	+0.06*	19.3	+0.04
11.2	-0.01	6.2	-0.02	6.3	+0.05	21.3	+0.03
12.2	0.00	6.8	-0.01*	7.3	+0.06	24.3	+0.04*
12.7	0.00*					24.7	+0.04*

* Interpolated value.

TABLE VII.—*Adopted Corrections for Runs of Microscopes—Continued.*

Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.	Date.	Corr. for 1'.
1906	"	1906	"	1907	"	1907	"
Sept. 25.3	+0.04	Nov. 22.3	+0.03	Feb. 11.2	+0.04*	Apr. 11.3	+0.06
29.3	+0.03	22.7	+0.03*	12.2	+0.04*	12.3	+0.06
Oct. 6.2	+0.02	23.3	+0.03*	13.2	+0.04	15.3	+0.07
7.2	+0.03*	26.3	+0.03*	13.7	+0.04*	17.3	+0.07
7.7	+0.03*	28.3	+0.04	14.2	+0.03	24.3	+0.07
8.3	+0.03	29.2	+0.03*	15.2	+0.03	27.3	+0.08
9.7	+0.03*	29.7	+0.02	15.7	+0.03*	29.3	+0.07*
11.2	+0.02*	Dec. 1.3	+0.02*	16.2	+0.03*	May 4.3	+0.05
11.7	+0.02*	2.3	+0.02	18.2	+0.04	9.3	+0.06*
12.2	+0.02*	3.7	+0.02*	21.2	+0.06*	11.3	+0.06
12.7	+0.02	4.3	+0.01	22.2	+0.06	13.3	+0.05
15.3	+0.01	7.3	+0.04	23.2	+0.06*	14.3	+0.06*
23.3	+0.05	11.3	+0.04*	25.2	+0.04	17.3	+0.07
26.2	+0.02	12.3	+0.03	25.7	+0.04*	20.3	+0.07*
29.2	+0.05	18.3	+0.03	27.2	+0.03	23.3	+0.08
29.7	+0.04*	18.7	+0.03*	Mar. 2.3	+0.06	June 3.3	+0.08
30.2	+0.04	23.2	+0.02*	4.3	+0.06	5.3	+0.07*
Nov. 1.2	+0.03	24.3	+0.02*	5.3	+0.05	6.3	+0.07*
1.7	+0.03*	25.3	+0.02	6.3	+0.04	8.3	+0.07
2.2	+0.04	26.3	+0.02*	6.7	+0.04*	15.3	+0.07
2.7	+0.04*	26.7	+0.02*	8.7	+0.04*	17.3	+0.06*
3.2	+0.04*			9.3	+0.04*	20.3	+0.05
4.2	+0.04*	1907		11.3	+0.05	21.3	+0.05*
4.7	+0.04*	Jan. 20.2	+0.03	15.3	+0.05	24.3	+0.05*
5.2	+0.04	21.2	+0.03*	15.7	+0.04*	26.3	+0.05*
5.7	+0.03*	22.7	+0.03*	16.3	+0.04	27.3	+0.05*
6.2	+0.01	23.2	+0.03	18.3	+0.04*	July 1.3	+0.05
7.3	+0.02	26.2	+0.04*	19.7	+0.04*	3.3	+0.06*
8.3	+0.02	28.2	+0.04	20.3	+0.04	6.3	+0.06*
9.3	+0.03*	30.7	+0.04*	22.3	+0.05*	8.3	+0.07
10.3	+0.04	Feb. 5.2	+0.03*	26.7	+0.06*	9.4	+0.07*
12.3	+0.02*	6.3	+0.02*	28.3	+0.06	11.4	+0.06*
13.3	+0.01	7.2	+0.02*	29.3	+0.05	12.4	+0.06
16.3	+0.02	8.2	+0.02	29.7	+0.05*	13.4	+0.06*
16.7	+0.02*	8.7	+0.03*	Apr. 1.3	+0.04		
17.3	+0.02	9.2	+0.04	3.3	+0.05		
21.3	+0.04	10.2	+0.04*	9.3	+0.08		

* Interpolated value.

THE RIGHT ASCENSION THREADS.

There were nine right ascension threads numbered consecutively from the comb. The equatorial intervals from the middle thread, as determined in 1904, were as follows:

TABLE VIII.—*Right Ascension Thread Intervals.*

Thread.	Interval.
I	+24.78
II	+19.81
III	+9.97
IV	+3.97
V	0.00
VI	-4.82
VII	-9.85
VIII	-19.83
IX	-24.77

THE VERTICAL CIRCLE.

The vertical circle was divided by the process of copying, the original being that of the firm of WARNER & SWASEY. The three other circles graduated by the same firm at about the same time for this observatory were automatically divided.

The silver graduated strip tarnished rapidly and also became discolored from rust formed at the junction of the silver and steel, so that frequent cleanings were necessary.

The errors of division were not measured, but their effect has been reduced by reading on two divisions under each microscope and by shifting the circle. The following table gives the position of the zenith point for the different periods:

TABLE IX.—*Circle Positions.*

Position.	Period.	Approx. Z. P.
		0
I	Feb. 23, 1898, to Oct. 18, 1902.....	179.9
II	Oct. 18, 1902, to Dec. 7, 1903.....	216.0
III	Dec. 7, 1903, to Feb. 8, 1906.....	0.0
IV	Feb. 8, 1906, to July 13, 1907.....	36.4

The circle divisions used in Positions I and III, and II and IV were nearly the same, but they were far enough removed from each other to introduce different accidental errors of divisions. From a comparison of results of observations of stars in Positions III and IV, it is found that the element of probable error due to division error for an observation in one position of the circle is $\pm 0''.15$. As the observations upon which the comparisons were based may be affected by common periodic errors, the total error due to division errors may be larger than indicated.

The eccentricity of the circle which was rather large was measured a number of times, and with the circle shifted to different positions, in order to locate the source of the trouble. The results show that the effect is due almost entirely to eccentricity of the hub. The following table, in which Z_0 is the reading of the setting microscope when the telescope pointed to the zenith, P_c is the position angle referred to the circle, and P_h is the position angle referred to a fixed point on the hub, gives the different observed values of the eccentricity e .

TABLE X.—*Eccentricity of Vertical Circle.*

Date.	Obsr.	e	Z_0	P_c	P_h
		"	"	"	"
April, 1899 .	Hill.	5.98	90.0	291.0	21.0
Do.....	"	6.49	90.0	290.4	20.4
March, 1904 .	Littell.	7.10	0.0	16.5	10.5
May, 1906.....	"	6.28	36.4	341.6	18.0
January, 1908..	"	6.22	36.4	343.3	19.7
Do.....	"	6.73	126.4	254.0	20.4
Do.....	"	7.22	216.4	168.0	24.4
Do.....	"	6.70	306.4	75.0	21.4
Do.....	"	6.34	36.4	340.5	22.9
Do.....	"	6.64	36.4	348.7	25.1

THE FLEXURE OF THE TELESCOPE.

After the erection of a larger building for the alt-azimuth and the installation of collimators, see page xxxv, the horizontal flexure of the telescope was determined by Messrs. LITTELL and MORGAN. Reversing prisms were used on the telescope and on the north collimator to free the results from the effects of bisection errors. From 13 determinations on different nights in March, April, and June, 1910, the value $0''.79 \pm 0''.063$ was determined. The objective end of the telescope is longer than the micrometer end, and bends more under the action of gravity.

The corrections to the observed declinations on account of flexure are given in the following table:

TABLE XI.—*Corrections to Declinations for Flexure.*

Z. D. S.	Corr.	Z. D. S.	Corr.	Z. D. S.	Corr.
285 S. P.	-0.76	330	+0.39	25	-0.33
290 S. P.	0.74	335	0.33	30	0.39
295 S. P.	0.72	340	0.27	35	0.45
300 S. P.	0.68	345	0.20	40	0.51
305 S. P.	0.65	350	0.14	45	0.56
308.9 S. P.	-0.62	355	+0.07	50	0.61
308.9	+0.62	0	0.00	55	0.65
310	0.61	5	0.07	60	0.68
315	0.56	10	0.14	65	0.72
320	0.51	15	0.20	70	0.74
325	0.45	20	0.27	75	0.76

METHODS OF REDUCTION.

The observation before and the observation after reversal were reduced independently as far as the reduced circle readings. From these the zenith pointing of the telescope and the zenith distance of the object were immediately obtained.

The reduction to meridian for observations made with the instrument in the meridian was computed by the formula

$$+ 112''.5 \sin 1'' i^2 \tan \delta$$

in which the sign as given applies to zenith distance south, or circle readings circle east, and i is the equatorial interval in seconds of time between the middle thread and the point where the bisection was made.

The reduction to meridian for circummeridian observations was computed by the formula

$$- \frac{2 \cos \varphi \cos \delta \sin^2 \frac{1}{2} t}{\sin z \sin 1''}$$

in which the sign applies to zenith distance south, or circle readings circle east, and z is the mean of the zenith distances south of the object at the time of observation and at the time of meridian passage. For convenience there were tabulated to facilitate the computation,

$$\log A = \log \frac{\cos \varphi \cos \delta}{\sin z} \text{ and } \log m = \log \frac{2 \sin^2 \frac{1}{2} t}{\sin 1''}.$$

The Pulkowa refraction tables have been used, as tabulated for the use of this observatory in Appendix II, Volume IV, second series, Publications of the U. S. Naval Observatory.

The assumed latitude of the instrument was $+38^\circ 55' 16''.67$. For the reduction of each night's work this latitude has been corrected for variation of latitude in accordance with the results published from time to time by Dr. TH. ALBRECHT, based on the work done under the auspices of the International Geodetic Association.

When reduction to mean place has been necessary, the computation has been made by the use of the independent star numbers of the American Ephemeris and Nautical Almanac.

ACCIDENTAL ERRORS.

By comparing the observations made by the same observer using the same circle divisions the probable errors of each observer for a single observation were determined, not including the effect of division error. Also from the final results, the probable error of a single observation was obtained, including the effect of division error and residual personal errors. The probable errors were computed by the formula of C. A. F. PETERS,

$$r = 0.8453 \sqrt{\frac{[v]}{m(m-1)}}.$$

The results are given in the following table:

TABLE XII.—*Probable Errors.*

Z. D. S.	Hill.		Evans.		Littell.		From Final Results.	
	r	No. Obs.	r	No. Obs.	r	No. Obs.	r	No. Obs.
0 0	"	"	"	"	"	"	"	"
285-290	. . . .	. . . .	. . . .	. . . .	0.497	161	0.520	166
290-310	0.456	127	0.530	59	.351	406	.395	618
310-330	.465	135	.395	42	.296	488	.377	715
330-350	.477	81	.298	28	.240	584	.334	735
350-10	.526	231	.378	6	.284	766	.365	1098
10-30	.405	208	.343	61	.245	912	.330	1285
30-50	.349	204	.320	83	.266	852	.349	1229
50-70	.465	191	.440	62	.327	814	.394	1154
70-75	0.537	35	0.529	23	0.434	167	0.526	244
Polaris, night	0.417	47	. . . .	. . . .	0.310	73	. . . .	. . . .
Polaris, day	0.403	30	. . . .	. . . .	0.332	92	. . . .	. . . .

The probable errors of observation for HILL were computed separately for the work in which the micrometer was used with the instrument usually in the meridian, and for the work in which the micrometer was not used and the instrument was out of the meridian, but there was no material difference in the results. The probable errors for LITTELL were computed separately for several different periods and showed a small but regular decrease, those for the last 18 months being about 10 per cent less than the general average.

The probable errors assigned for Polaris have been computed on the assumption that all the observations are independent as to the errors affecting them. However, after November 27, 1903, it was the custom, when time permitted, to get two observations of Polaris at each culmination, and it is quite probable that some of the errors affecting two nearly simultaneous observations might be persistent. In order to investigate this the probable error was deduced first by comparing the observations made on different dates from which the value $0''.332$ based on 165 observations was determined for a single observation, or $0''.235$ for the mean of two observations. The probable error deduced for a double observation, however, was $0''.268$ based on 68 double observations. There is, therefore, indication of the presence of the kind of error referred to, and two observations of Polaris taken at the same culmination are not quite as valuable as two observations taken at different culminations. Among the causes which might produce such an effect are variations of personal bisection error from night to night, sticking of the level bubble at certain points of the tubes, anomalies of refraction, and short-period variations of latitude.

SYSTEMATIC CORRECTIONS.

Three sets of systematic corrections have been applied to reduce the observations to a more homogeneous basis.

1. *Corrections dependent upon the position of the circle.*—Upon comparing the observations of the same stars by the same observer in Positions III and IV of the

circle on its axis (see Table IX), it was found that there were sensible systematic differences, due probably to periodic errors of division. These differences should vanish at zenith distances 0° and 45° , should repeat after 90° , and should be equal but opposite in sign for equal zenith distances north and south. Table XIII gives one-half the difference, or the correction to observations in Position IV, as observed and as adopted. In obtaining these differences the double-thread observations which, as explained later, are affected by other systematic errors, were not used. After the corrections for the double-thread observations had been obtained they were included in a new solution, the result of which differed so little from the first that no change has been made. The signs in the table apply to declinations observed in Positions II and IV of the circle, it being assumed that the same corrections apply for Position II as for Position IV. The signs must be changed for Positions I and III.

TABLE XIII.—*Corrections for Systematic Differences Varying with Position of Circle on Axis.*

Z. D. S.	Observed.	Adopted.	Z. D. S.	Observed.	Adopted.
0	"	"	0	"	"
0.4	+0.06	-0.02	23.6	+0.18	+0.18
1.6	-0.12	-0.10	24.6	+0.24	+0.22
2.5	-0.19	-0.15	25.7	+0.24	+0.18
3.5	-0.04	-0.06	26.6	+0.06	+0.10
4.6	+0.06	+0.05	27.5	+0.12	+0.13
5.7	+0.12	+0.12	28.6	+0.26	+0.19
6.5	+0.21	+0.22	29.5	+0.10	+0.08
7.4	+0.40	+0.25	30.5	-0.11	-0.06
8.7	+0.04	+0.06	31.6	-0.12	-0.14
9.5	-0.12	-0.07	32.5	-0.24	-0.19
10.6	-0.05	-0.10	33.5	-0.19	-0.16
11.5	-0.17	-0.10	34.6	-0.06	-0.08
12.6	+0.10	+0.02	35.6	0.00	0.00
13.6	+0.09	+0.08	36.6	+0.04	+0.04
14.6	+0.06	+0.06	37.4	+0.09	+0.08
15.6	+0.04	+0.12	38.6	+0.14	+0.10
16.6	+0.34	+0.25	39.6	-0.01	0.00
17.6	+0.26	+0.30	40.6	-0.12	-0.13
18.6	+0.36	+0.30	41.5	-0.19	-0.19
19.6	+0.18	+0.20	42.7	-0.22	-0.20
20.6	+0.10	+0.10	43.6	-0.17	-0.18
21.6	+0.08	+0.09	44.6	-0.14	-0.10
22.4	+0.11	+0.12			

2. *Corrections to the double-thread observations.*—Before February 14, 1907, nearly all the observations were made with the use of a single thread. After that date Prof. LITTELL adopted the practice of using double threads, which apparently offered some advantage in precision and was especially well adapted for observing faint objects and for daylight observations. When the observations were reduced it was found that there were sensible systematic differences between the declinations obtained by the two methods, and further investigation disclosed the fact that this observer had a considerable bisection error for double-thread observations. In the

use of this instrument with a diagonal eyepiece, convenience in observing led to the practice of turning the eyepiece by varying amounts depending upon the zenith distance of the star, thus causing the orientation of the field to change in relation to the position of the observer; for example, at about 42° zenith distance the threads were apparently vertical, and at about 68° zenith distance the threads were in the reverse position from that for small zenith distances. It was accordingly found that the differences determined from the observations of the same stars by the two methods, when arranged in zones, showed systematic variation with the zenith distance. In making this determination, it was assumed that the effect should be the same but of opposite sign for stars at the same zenith distances north and south of the zenith. The following table gives the results. The signs apply to the declinations of south stars.

TABLE XIV.—*Corrections to Double-Thread Observations.*

Z. D.	Observed.	Adopted.
0	"	"
5	-0.43	-0.28
15	-0.25	-0.22
25	-0.08	-0.16
35	-0.10	-0.12
45	-0.22	-0.07
55	+0.08	+0.03
65	+0.21	+0.18
75	+0.24	+0.22

By means of the preceding corrections the double-thread observations, which were comparatively few in number, were reduced to the system of the single-thread observations. It then remained to ascertain whether the single-thread observations were affected by a similar systematic error. In order to test this an artificial star was arranged at the focus of the south collimator, and micrometer measures were made to determine the bisection error, using a single thread. The determination was made by Prof. LITTELL in four orientations of the field, with the thread horizontal designated as 0° and rotated anticlockwise 45° , 90° , and 135° , each compared with the reverse position, and by Mr. HILL in two positions, 0° and 90° . The results of these measures are given in the following table:

TABLE XV.—*Bisection Corrections for Single-Thread Observations.*

Obsr	$\frac{1}{2} (0^\circ-180^\circ)$		$\frac{1}{2} (45^\circ-225^\circ)$		$\frac{1}{2} (90^\circ-270^\circ)$		$\frac{1}{2} (135^\circ-315^\circ)$	
	Corr	No. Obs.	Corr.	No. Obs.	Corr	No. Obs.	Corr.	No. Obs.
LITTELL	-0.10 \pm 0.014	16	-0.01 \pm 0.008	12	+0.04 \pm 0.009	16	+0.04 \pm 0.006	12
HILL	-0.20 \pm 0.035	4			+0.01 \pm 0.035	4		

As a further test a list of 12 stars was observed in 1912 without the prism and with the reversing prism in two positions giving reversed fields. The results of these observations were rather discordant among themselves and with the results from the artificial star. The following table summarizes the results:

TABLE XVI.—*Results of Reversing-Prism Observations for Single-Thread Observations.*

Z. D. S.	A	B	C
0	" "	" "	" "
22	+0.16±0.06	+0.01±0.04	-0.04±0.01
68	+0.10±0.08	+0.04±0.06	+0.08±0.01

The column *A* is based on the comparison of the star observations without the use of the reversing prism with the means of those with the prism in two positions giving reversed fields, the column *B* is based on the comparison of the star observations with the prism in its two positions, and the column *C* is based on the measures on the artificial star. Owing to the varying orientation of the field in the customary manner of using the instrument, the corrections for zenith distance 22° should be of the opposite sign and one-half as large as that for zenith distance 68°.

No correction of this nature has been applied to the single-thread observations.

3. *Corrections for systematic differences between the observers.*—The intercomparison of the observations of the three different observers engaged in this work showed the existence of systematic differences. The comparison L-H was made separately for the observations by HILL with and without the use of the micrometer, but as no marked difference was found the results were combined. The following table gives the differences:

TABLE XVII.—*Systematic Differences between Observers.*

Z. D. S.	L-H	No. Stars.	L-E	No. Stars.
0 0	"		"	
285 to 320.....	-0.14	29	-0.29	17
320 to 0.....	-0.21	137	-0.41	17
0 to 40.....	+0.16	223	+0.57	52
40 to 75.....	+0.29	152	+0.49	55
All the north stars.....	-0.20	166	-0.36	34
All the south stars.....	+0.21	375	+0.54	107

If these differences were due to the usual form of bisection error they should vary with the zenith distance, in a manner similar to that in which the corrections for the double threads vary. In the differences L-H there is little evidence of variation with zenith distance; in the differences L-E there is evidence of a small variation with zenith distance.

In order to bring the work of the different observers to the same system, it was decided to apply to all observations of each observer a constant correction, changing sign at the zenith and pole, to reduce them to the mean of LITTELL and HILL; the

observations by EVANS being comparatively few. The following corrections have therefore been applied to the observed declinations:

TABLE XVIII.—*Corrections for Systematic Personal Errors.*

Z. D. S.	H.	E.	L.
° °	''	''	''
285 to 308.9	+0.10	+0.39	-0.10
308.9 to 0	-0.10	-0.39	+0.10
0 to 75	+0.10	+0.39	-0.10

CORRECTIONS TO THE ASSUMED LATITUDE AND REFRACTION.

A solution of the results from the observations of circumpolar stars observed at upper and lower culminations was made by the method of least squares to determine the corrections to the assumed latitude and refraction using equations of condition of the form

$$\Delta\phi + \frac{\tan z' + \tan z}{2} \Delta R - \frac{\Delta\delta' - \Delta\delta}{2}$$

in which the unaccented quantities refer to above pole and the accented quantities refer to below pole observations.

The declinations were first corrected for flexure, and the equations were weighted in accordance with the number of observations, the number of circle positions, and the zenith distances. The following table gives the data used in the solution, the stars being arranged in order of declination. The weights, p and p' , are given for the above and below pole positions, respectively. The weight of an equation of condition is accordingly $\frac{pp'}{p+p'}$. The same weights were subsequently used in combining the above and below pole observations to form the catalogue positions.

TABLE XIX.—*Data for Determination of $\Delta\phi$ and ΔR .*

Name.	Approx R. A.	$\frac{\Delta\delta' - \Delta\delta}{2}$	$\frac{\tan z' + \tan z}{2}$	p	p'
	<i>h</i> <i>m</i>	''			
α Draconis.	14 1	+0.24	+2.28	18	2
249 β Urs. Maj	11 17	+0.72	+2.28	5	2
γ Draconis	13 48	-0.12	+2.24	15	4
1 δ Camelop	3 12	-0.04	+2.22	10	4
32 Urs. Maj	10 11	+0.22	+2.18	10	4
ϵ Cephei	22 46	-0.06	+2.17	15	4
36 Camelop	6 3	-0.04	+2.16	5	2
ζ Draconis	17 8	+0.16	+2.14	17	3
55 Draconis	19 9	-0.34	+2.14	11	2
8 Draconis	12 51	-0.41	+2.14	5	2
55 Cassiop.	2 7	+0.26	+2.12	10	4
30 η Urs. Maj	10 17	+0.25	+2.12	10	4
α Camelop	4 44	+0.16	+2.12	14	4
2 θ Urs. Min	14 56	-0.75	+2.10	10	2
13 δ Camelop	3 37	+0.42	+2.03	12	4
ϵ Cassiop.	2 21	+0.15	+2.02	9	4
41 η Cephei	23 43	-0.40	+1.99	5	2
3 Draconis	11 37	+0.08	+1.99	9	4

TABLE XIX.—Data for Determination of $\Delta\phi$ and ΔR —Continued.

Name.	Approx. R. A.		$\frac{\Delta\delta' - \Delta\delta}{2}$	$\frac{\tan z' + \tan z}{2}$	p	p'
	<i>h</i>	<i>m</i>	"			
δ Draconis.....	19	13	-0.54	+1.98	7	3
118 H ⁱ . Cassiop.....	2	36	-0.20	+1.98	5	2
σ^2 Urs. Maj.....	9	2	0.00	+1.98	12	4
σ Cephei.....	23	15	+0.22	+1.96	15	4
ω Cassiop.....	1	35	+0.22	+1.96	8	2
ψ Cassiop.....	1	19	-0.65	+1.95	8	4
1 H. Urs. Min.....	15	13	+0.47	+1.95	9	2
ρ Urs. Maj.....	8	54	-0.75	+1.92	12	4
87 B. Draconis.....	16	6	+0.51	+1.92	12	4
f Draconis.....	17	32	+0.34	+1.90	12	4
143 B. Camelop.....	7	20	-0.06	+1.86	9	4
ω Draconis.....	17	38	-0.10	+1.86	9	4
3 H. Urs. Maj.....	8	3	+0.22	+1.86	17	4
A Draconis.....	16	28	-0.06	+1.84	14	4
43 Camelop.....	6	43	-0.02	+1.84	11	6
22 H. Camelop.....	6	8	+0.12	+1.80	9	4
35 H. Urs. Maj.....	10	36	-0.18	+1.79	10	4
89 B. Urs. Maj.....	9	34	-0.11	+1.78	9	4
38 Cassiop.....	1	24	+0.22	+1.78	4	4
λ Draconis.....	11	25	-0.35	+1.77	10	4
ϵ Draconis.....	19	48	+0.02	+1.76	24	8
β Cephei.....	21	27	-0.22	+1.75	13	4
κ Draconis.....	12	29	-0.11	+1.74	12	3
d Urs. Maj.....	9	26	-0.09	+1.74	13	4
11 Cephei.....	21	40	+0.09	+1.70	14	3
γ Camelop.....	3	40	+0.58	+1.69	12	4
ν Draconis.....	18	56	-0.10	+1.68	11	5
ϕ Draconis.....	18	22	-0.16	+1.68	10	6
13 B. Urs. Min.....	13	35	-0.05	+1.65	18	2
24 Cephei.....	22	8	+0.24	+1.64	14	10
50 Cassiop.....	1	55	-0.78	+1.64	4	2
γ^2 Urs. Min.....	15	21	-0.24	+1.62	8	4
ψ^1 Draconis.....	17	44	+0.08	+1.62	8	3
212 H ⁱ . Draconis.....	20	30	+0.08	+1.62	14	7
36 H. Cassiop.....	2	29	+0.34	+1.61	4	3
40 Cassiop.....	1	31	+0.12	+1.60	8	4
γ Draconis.....	18	23	+0.06	+1.60	12	6
16 Cephei.....	21	58	-0.12	+1.60	8	8
9 B. Urs. Min.....	13	24	+0.03	+1.58	7	3
τ Draconis.....	19	17	-0.40	+1.57	6	4
31 Cephei.....	22	33	+0.06	+1.57	4	3
158 B. Cephei.....	21	52	+0.30	+1.56	12	5
109 B. Urs. Maj.....	9	49	-0.53	+1.56	8	5
Gr. 4163.....	23	50	+0.10	+1.54	14	8
57 H ⁱ . Camelop.....	4	52	+0.17	+1.54	8	5
181 B. Camelop.....	8	29	-0.05	+1.54	7	3
166 B. Camelop.....	7	48	-0.24	+1.52	8	4
21 Cassiop.....	0	39	-0.33	+1.52	5	4
β Urs. Min.....	14	51	-0.02	+1.51	12	5
73 Draconis.....	20	33	+0.24	+1.51	9	4
κ Cephei.....	23	5	+0.21	+1.50	8	10
74 B. Camelop.....	5	26	-0.28	+1.50	8	5
50 Draconis.....	18	50	-0.37	+1.48	6	4
226 B. Cephei.....	22	31	+0.68	+1.46	11	5
35 B. Camelop.....	4	35	+0.04	+1.46	8	5
η Urs. Min.....	16	20	+0.02	+1.45	14	5
173 B. Camelop.....	8	7	+0.10	+1.45	11	5
5 Urs. Min.....	14	28	-0.02	+1.45	11	4
19 Urs. Min.....	16	14	+0.50	+1.45	19	5
9 H. Draconis.....	10	27	-0.05	+1.44	14	8
318 B. Cephei.....	0	11	+0.83	+1.44	7	7
35 Draconis.....	17	54	-0.10	+1.42	8	6
24 H. Camelop.....	6	45	+0.01	+1.42	6	3
γ Cephei.....	23	35	-0.09	+1.42	12	8
48 H. Cephei.....	3	8	+0.26	+1.41	8	5
156 H ⁱ . Draconis.....	18	34	-0.12	+1.40	9	4
κ Cephei.....	20	12	+0.02	+1.40	12	8
14 H ⁱ . Draconis.....	12	0	+0.04	+1.40	7	4
θ Urs. Min.....	15	34	-0.07	+1.40	17	5
70 B. Urs. Min.....	16	35	-0.16	+1.40	14	6
98 B. Cephei.....	21	7	+0.18	+1.40	11	8

TABLE XIX.—Data for Determination of $\Delta\varphi$ and ΔR —Continued.

Name.	Approx. R. A.	$\Delta\delta' - \Delta\delta$ 2	$\tan z^1 + \tan z$ 2	ρ	ρ'
	<i>h m</i>	"			
4 Urs. Min	14 9	-0.16	+1.39	15	3
5 Urs. Min	15 48	+0.27	+1.39	11	5
4 H. Draconis	12 8	+0.16	+1.38	8	3
6 H ¹ . Draconis	10 52	0.00	+1.38	7	3
19 H. Camelop.	5 6	+0.26	+1.36	8	5
47 H. Cephei	2 53	+0.34	+1.36	7	5
44 H. Cephei	1 4	-0.20	+1.36	4	7
225 B. Draconis	19 28	+0.13	+1.36	14	9
23 H. Camelop.	6 29	+0.34	+1.34	10	5
40 Draconis	18 8	-0.14	+1.34	4	5
220 H ¹ . Draconis	20 52	-0.33	+1.34	8	4
142 H ¹ . Cephei	2 33	+0.38	+1.32	5	5
Gr. 1278	7 16	-0.81	+1.32	7	10
75 Draconis	20 35	-0.34	+1.32	4	3
Gr. 1480	8 56	+0.38	+1.32	5	4
Gr. 1255	7 6	-0.38	+1.31	4	3
1 H. Draconis	9 23	+0.06	+1.30	13	12
319 B. Cephei	0 32	-0.22	+1.30	4	4
6 Urs. Min	16 56	+0.06	+1.30	12	6
76 Draconis	20 50	-0.50	+1.30	15	11
25 H. Camelop.	7 10	+0.20	+1.30	13	12
Gr. 1391	8 5	+0.48	+1.29	4	3
30 H. Camelop.	10 19	-0.24	+1.28	7	7
B. D. +83° 233	8 44	-0.64	+1.28	2	3
B. D. +83° 552	19 28	+0.56	+1.28	5	3
36 H. Cephei	22 55	-0.05	+1.28	7	12
322 H. Camelop.	12 48	+0.83	+1.28	8	3
Gr. 3260	20 24	+0.46	+1.27	5	5
Gr. 3212	20 14	+0.12	+1.27	4	5
29 H. Camelop.	10 15	+0.56	+1.27	10	5
158 H ¹ . Cephei	5 30	+0.02	+1.26	7	10
1 Urs. Min	13 18	+0.28	+1.26	7	3
151 H ¹ . Cephei	4 5	+0.13	+1.26	7	11
Gr. 1418	8 25	+0.46	+1.26	12	13
32 H. Cephei	22 21	+0.38	+1.26	11	10
43 H. Cephei	0 55	+0.54	+1.26	7	11
157 H ¹ . Cephei	4 57	+0.56	+1.26	11	5
128 H ¹ . Camelop.	12 0	+0.64	+1.26	15	3
149 H ¹ . Cephei	3 34	-0.06	+1.25	7	14
8 Urs. Min	18 5	+0.32	+1.25	16	30
B. A. C. 7504	21 20	-0.10	+1.25	10	9
39 H. Cephei	23 28	+0.18	+1.25	6	10
Gr. 1004	6 9	+0.38	+1.25	10	5
5 B. Urs. Min	12 14	+0.32	+1.24	12	3
24 Urs. Min	18 8	+0.18	+1.24	10	5
51 H. Cephei	6 54	+0.31	+1.24	22	20
57 B. Urs. Min	15 9	+0.64	+1.24	12	3
Gr. 2006	13 5	+0.09	+1.24	12	3
6 B. Urs. Min	12 14	+0.20	+1.24	10	5
1 B. Urs. Min	0 55	+0.14	+1.24	4	7
a Urs. Min	1 22	+0.40	+1.24	29	30
Gr. 3402	19 59	-0.36	+1.24	8	3
4 B. Urs. Min	7 58	+0.50	+1.24	11	10
2 Urs. Min	19 22	+0.21	+1.24	6	11

The values resulting from the solution of the normal equations are

$$\Delta\varphi = +0''.519 \pm 0''.090$$

$$\Delta R = -0''.282 \pm 0''.058$$

The mean residuals from the equations of condition after the substitution of these values, grouped according to right ascension and according to declination, are as follows:

Right Ascension.	Mean Residual.	Declination.	Mean Residual.
<i>h</i> <i>h</i>	"	° °	"
0 to 6	-0.05	64.8 to 71.9	-0.02
6 to 12	+0.02	72.0 to 79.2	+0.06
12 to 18	-0.02	79.4 to 89.0	-0.01
18 to 0	+0.07		

A similar solution made preliminarily, using only the observations by Prof. LITTELL, gave the following results:

$$\Delta\varphi = +0''.503 \pm 0''.090$$

$$\Delta R = -0''.224 \pm 0''.056$$

While it is doubtless true that the Pulkowa refraction tables require a negative correction for the proper representation of the refraction at this observatory, it is not probable that the correction required is so large as is here indicated, and the above corrections have not been applied to the observations. In order to show how these corrections would affect the results, a table based upon them is given below. If it be desired to correct the catalogue positions by the data given in this table, the corrections in the table must, of course, be diminished by the value of $\Delta\varphi$ actually adopted in the reduction of the observations, see page XXIV.

TABLE XX.—*Corrections to Declinations, Based on $\Delta\varphi = +0''.519$, $\Delta R = -0''.282$.*

Declination.	Corr.	Declination.	Corr.
°	"	°	"
+65 S. P.	+0.62	+40	+0.51
70 S. P.	+0.30	35	+0.54
75 S. P.	+0.12	30	+0.56
80 S. P.	-0.01	25	+0.59
85 S. P.	-0.10	20	+0.62
90 S. P.	-0.17	15	+0.64
90	+0.17	10	+0.68
85	+0.23	+ 5	+0.71
80	+0.27	0	+0.75
75	+0.31	- 5	+0.79
70	+0.35	10	+0.84
65	+0.38	15	+0.90
60	+0.41	20	+0.99
55	+0.44	25	+1.09
50	+0.46	30	+1.25
+45	+0.49	-35	+1.50

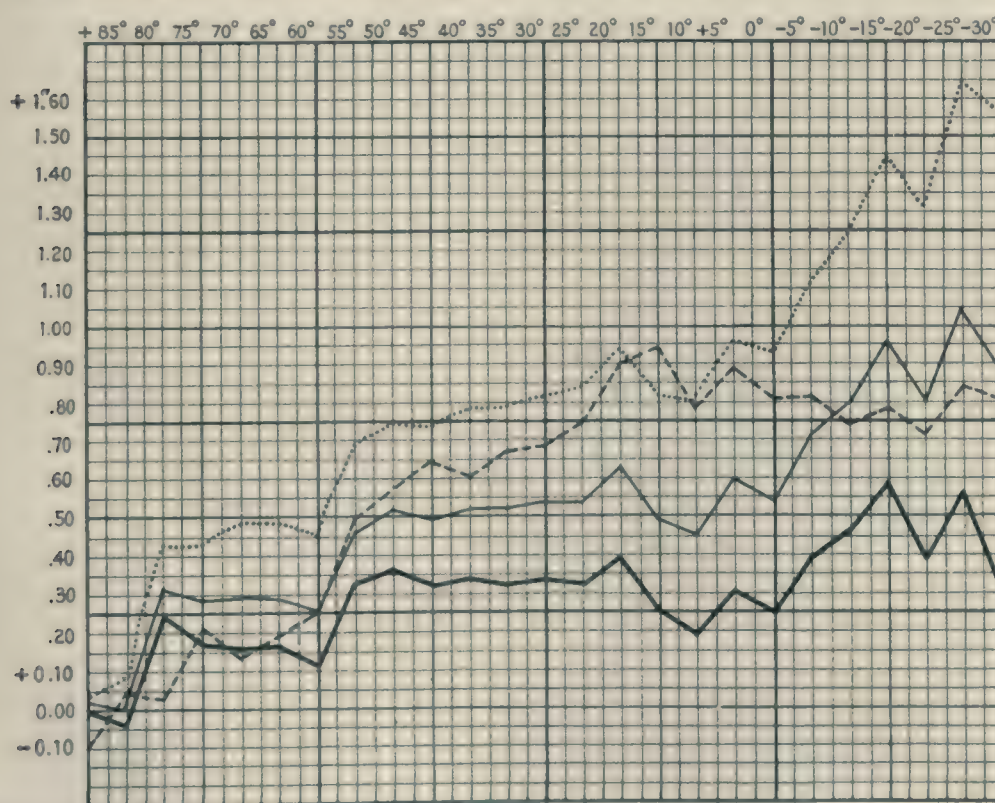
If it be assumed that the refraction correction is zero, the correction to the latitude becomes

$$\Delta\varphi = +0''.089 \pm 0''.017.$$

This correction has been applied to the observations.

The following diagram shows the result of the comparison of these observations with the positions of the Preliminary General Catalogue of Prof. Boss on three hypotheses with regard to the refraction constant. One line shows the comparison, using the Pulkowa refraction uncorrected; a second line shows the comparison correcting the refraction by the result obtained from the 9-inch transit circle observations from 1903 to 1911, these observations being yet unpublished; and a third line shows the comparison correcting the refraction by the result obtained from the alt-azimuth observations. There has also been added a line, based on preliminary and somewhat incomplete reductions, representing the observations of the 9-inch transit circle for the period named, reduced with the refraction constant determined from the observations themselves. In each case the corresponding $\Delta\varphi$ has been included.

Diagram of Corrections to Boss's Catalogue for Different Values of the Refraction Constant.



The heavy line represents *Alt-azimuth - Boss*, using the Pulkowa refraction.

The light line represents *Alt-azimuth - Boss*, using the correction to the refraction determined by the 9-inch transit circle observations of circumpolars, 1903-1911.

The broken line represents *9-inch transit circle - Boss*, using the same corrections.

The dotted line represents *Alt-azimuth - Boss*, using the correction to the refraction determined from the alt-azimuth observations of circumpolars.

EFFECT OF MAGNITUDES OF STARS.

The corrections given by these observations to the positions of Boss's Catalogue were examined for variation dependent on the magnitudes of the stars. The following table gives the results:

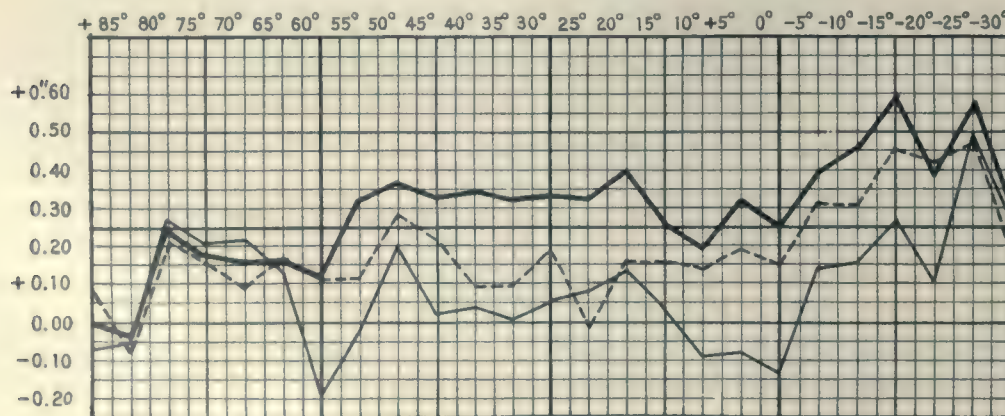
TABLE XXI.—*Differences Dependent upon Magnitude.*

Declination.	Zone I. +90° to +60°			Zone II. +60° to +39°			Zone III. +39° to +10°			Zone IV. +10° to -10°			Zone V. -10° to -35°		
	No. Stars.	Mean Mag.	Mean Corr.	No. Stars.	Mean Mag.	Mean Corr.	No. Stars.	Mean Mag.	Mean Corr.	No. Stars.	Mean Mag.	Mean Corr.	No. Stars.	Mean Mag.	Mean Corr.
Fainter stars . . .	85	5.98	+0.136	98	5.49	+0.287	102	5.40	+0.296	116	5.33	+0.267	133	5.36	+0.450
Brighter stars . . .	84	4.56	+0.138	97	3.71	+0.297	162	3.65	+0.355	115	3.68	+0.295	133	3.63	+0.462
Difference . . .		1.42	-0.002		1.78	-0.010		1.75	-0.059		1.65	-0.028		1.73	-0.012
		"	"		"	"		"	"		"	"		"	"
Difference for 1 mag.		-0.001			-0.006			-0.034			-0.017			-0.007	

Nearly all the stars in Zone I were observed both above and below the pole, so that any systematic errors of observation due to magnitude would be to some extent eliminated in this zone. As the apparent configuration of the field is reversed between Zones II and III, because they are on opposite sides of the zenith, and between Zones III and V, because of the use of the diagonal eyepiece, it is evident that the results, if assumed to be due to systematic errors in the observations, are contradictory, and the only conclusion to be drawn is that the differences, if any, due to magnitude are small.

COMPARISONS WITH CATALOGUES.

The observations have been compared with the catalogues of NEWCOMB, AUWERS, and BOSS in 5° zones. The accidental errors indicated for the separate stars are somewhat large, as might be expected from the small number of observations of many of them and from the lack of division error corrections. There seems to be also some indication of small systematic errors. There is little evidence of any systematic error at the zenith, so that it appears that bisection errors of a kind that change sign at the zenith have not influenced the general results. The results of these comparisons are shown in the accompanying diagram:

Diagram Showing Corrections to Standard Catalogues.

The light line represents *Alt-azimuth—Newcomb*.

The heavy line represents *Alt-azimuth—Boss*.

The broken line represents *Alt-azimuth—Auwers*.

The vertical distances represent the corrections given by the observations to the catalogue declinations; the horizontal distances represent the declinations of the stars.

ALTERATIONS IN THE BUILDING AND INSTRUMENT SINCE 1907.

In view of the fact that mention has been made of conditions adversely affecting the use of this instrument, it is deemed proper to give here a brief account of the changes which have been made in the installation to remedy these conditions and to effect other improvements though the results here published are not affected by the changes.

New building.—A new building was erected in 1907. It is rectangular, $23\frac{1}{4}$ by $15\frac{1}{4}$ feet, outside, the longer dimension being north and south. The walls are double, of corrugated galvanized iron with 6-inch air space between. The roof is in two sections, which can be easily rolled off to the east and west, respectively, on elevated iron tracks by means of a rack and pinion mechanism operated by a sheave rope within the building. The tops of the side walls are approximately on a level with the axis of the instrument so that when the roof sections are rolled off the building the instrument is practically in the open air. There are two windows in each side wall, except the north side, which has a window and a door.

Horizontal collimators.—Two marble piers, one north and one south of the instrument, were installed, and on them were mounted collimators of $2\frac{1}{8}$ inches aperture and 35 inches focal length. These piers and collimators were originally used with the 9-inch transit circle, but were replaced by larger ones. The collimators give very good definition. The openings of the cube of the instrument are $2\frac{1}{8}$ inches in diameter.

Regraduation of the vertical circle.—This circle was regraduated by The WARNER & SWASEY Company by the automatic process. The lines were cut with a steel tool and are not as fine and smooth on the edges as lines cut with a diamond. However, after many experiments fairly good lines were obtained with the steel tool by the method of burnishing. Owing to unavoidable delays the circle was not returned to the observatory until April, 1909.

The graduated strip is an alloy of gold with 20 per cent silver, giving a bright yellow surface for a background for the divisions. The contract with The WARNER & SWASEY Company required that the steel circle including the matrix for the gold strip should be first heavily copper plated and then heavily silver plated, in the hope that this would eliminate the rust trouble. But in the spring of 1910, after a prolonged spell of damp weather, it was found that there was a recurrence of the trouble. The circle was later put in good condition by the makers and very carefully painted over the junction of the steel and gold, leaving uncovered only a very narrow strip of the gold, approximately one-sixteenth inch wide, near the middle of which are the divisions. After the circle was returned, in January, 1911, a conical cloth canopy was made for the instrument, and the practice was adopted of slightly heating the air under the canopy by means of electric lamps during periods of condensation. As a result of these precautions the circle has remained in good condition. It looks nearly as bright as it did when received about two years ago, and it is hoped that it will be entirely satisfactory as to the permanence of its division lines, and that they will be free from the apparent displacements which were formerly caused by changes in their appearance under the microscopes dependent upon the condition of the circle as to cleanness.

The errors of the degree lines have been determined by Messrs. MORGAN and PAWLING.

The pivots were reground and the eccentricity, which had been large (see p. XXII), was reduced about one-half. The pivots were examined by means of the spherometer caliper apparatus and were found to be excellent.

Micrometer.—A new screw and bearing head of improved design was made for the zenith distance micrometer (see p. XVI), and the ROGERS registering head, which registered only two bisections, was altered so as to register four bisections. The ocular, which moved only in zenith distance, was altered so as to move also in the other coordinate. These changes were made to adapt the instrument for use as a quickly reversible transit circle for declination work, and to enable the observer to obtain two bisections before and two after meridian passage. The threads of the right ascension reticle were also respaced to afford convenient bisection points.

Microscopes.—The objectives of the microscopes were quite poor and were replaced by new and excellent ones made by the BAUSCH and LOMB Optical Company, of Rochester, N. Y. They also furnished new oculars of $\frac{5}{8}$ inch focal length which increase the magnifying power from 30 to 48 diameters. The oculars were provided with reversing prisms so that all divisions may be given the same apparent orientation, as for example, all vertical. Both objectives and oculars were provided with screw adjustment for convenience in focusing and in adjusting runs.

Reversing prism for telescope.—A reversing prism for the ocular of the telescope was made by the JOHN A. BRASHEAR Company. It is provided with a stop to limit the rotation to a quarter turn.

Field illumination.—The WARNER & SWASEY Company have attached a totally reflecting prism in the cube, and a mirror has been cemented on the center of the outside of the objective in order to provide central illumination of the field. The source of light is a small battery electric lamp, whose light enters through one of the pivots and is reflected to the field by means of the prism and the mirror.

EXPLANATION OF THE PRINTED OBSERVATIONS AND REDUCTIONS (PP. I-389).

The headings of the columns are in general self-explanatory.

The names of the stars, except those of a few stars not therein contained, are those given in NEWCOMB's Suggested List of Fundamental Stars, Astronomical Papers, Prepared for the Use of the American Ephemeris and Nautical Almanac, Volume VIII, Part II.

The observers are designated as follows:

E. = H. B. EVANS.

H. = G. A. HILL.

L. = F. B. LITTELL.

The column *Circle* gives the position of the instrument.

The column *Seeing* gives the observer's estimate of the quality of the seeing when it was made on the numerical scale, see page x. Other notes regarding the seeing are given as footnotes.

The column *Clock Time* gives the observed clock time of the observation when the time is necessary for the reduction. In all other cases it gives the approximate right ascension of the object. The clock corrections are given in TABLE IV, page XIII et seq.

The column *Hour Angle* gives the difference between the corrected clock time of the observation and the right ascension of the object.

For the levels there is given in each case the mean of the readings of the two ends of the bubble.

The column *Inst. Corr.* gives the sum of the corrections for inclination when the observation was at a side thread, for runs and for level.

The column *Apparent Declination* gives the declination deduced from the data in the preceding columns, using the assumed latitude given on page XXIV.

At the bottom of each page are given the meteorological data for the determination of the refraction, explanatory notes, the zenith pointing of the instrument as determined from each observation, and the reductions to mean place for the stars which were not in either of the four principal ephemerides.

EXPLANATION OF THE INDIVIDUAL RESULTS OF OBSERVATIONS (PP. 393-445).

For the stars contained in NEWCOMB'S Catalogue of Fundamental Stars the individual results are given as corrections to the apparent declinations based on that catalogue, and the declination from the catalogue for the mean equator 1900.0 corrected for proper motion to the mean date of observation is also given.

For the stars not contained in NEWCOMB'S Catalogue, the declinations resulting from the individual observations are given for the mean equator 1900.0.

The Roman numerals I, II, III, and IV, following the individual results, refer to the four positions of the circle on its axis, see page XXII.

The correction designated by *Corr.* given for each object is the sum of the corrections for the flexure of the telescope, see page XXIII, and the correction for error of the assumed latitude, see page XXXII.

EXPLANATION OF THE CATALOGUE (PP. 447-465).

The magnitudes are those of the Revised Harvard Photometry, Annals of the Astronomical Observatory of Harvard College, Volumes L and LIV. For variable stars the limiting magnitudes are given.

The declinations are derived from the means of the individual results by the application of the corrections for flexure and latitude. For stars observed, both above and below the pole, the two resulting declinations have been combined in accordance with the weights given in TABLE XIX, page XXIX et seq. The declinations are for the epoch given in the column *Mean Date* and for the mean equator 1900.0.

The precessions and secular variations are based on NEWCOMB'S constants.

OBSERVATIONS
AND
REDUCTIONS.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	February 23, H. α Cygni	W	...	20 38	...	48.85	48.45	24.030	185 52 1.12	+ 9.19	- 0.34	+ 6.11	+44 54 48.70
		E	...		...	40.15	38.55	25.948	173 51 59.98	- 0.73	+ 0.34	- 6.11	
2	February 26, H. α Ursæ Minoris	E	...	1 21	...	42.90	47.00	25.452	130 1 59.38	+ 0.14	+ 0.61	- 1 9.67	+88 46 12.13
		W	...		...	51.95	57.00	24.562	229 41 58.55	+10.32	- 0.61	+ 1 9.08	
3	δ Ursæ Minoris s. p.	E	...	6 5	...	44.15	48.55	23.712	125 26 0.98	- 0.14	- 0.22	- 1 23.47	+86 36 25.71
		W	...		...	51.40	56.25	26.111	234 18 3.08	+ 7.86	+ 0.22	+ 1 23.47	
4	February 28, H. α Cygni	W	...	20 38	...	53.50	52.55	24.014	185 52 0.78	+ 7.93	- 0.34	+ 6.23	+44 54 47.94
		E	...		...	45.90	43.90	25.985	173 51 58.08	- 0.73	+ 0.34	- 6.23	
5	March 1, H. α Ursæ Minoris	W	...	1 21	...	52.40	51.35	24.522	229 41 58.95	+10.63	- 0.61	+ 1 9.04	+88 46 11.20
		E	...		...	43.10	40.85	25.492	130 1 57.32	+ 0.07	+ 0.61	- 1 9.04	
6	α Aurigæ	E	...	5 9	...	44.60	43.00	24.218	172 54 3.18	+ 2.86	+ 0.35	- 7.19	+45 53 53.39
		W	...		...	51.75	50.80	25.483	186 50 3.52	+10.85	- 0.35	+ 7.19	
7	δ Ursæ Minoris s. p.	W	...	6 5	...	52.35	51.05	26.195	234 17 59.45	+10.74	+ 0.22	+ 1 22.40	+86 36 26.17
		E	...		...	44.55	42.10	23.739	125 25 59.60	+ 1.80	- 0.22	- 1 22.51	
8	March 3, H. α Ursæ Minoris	E	...	1 21	...	50.75	49.85	25.496	130 1 57.98	+ 0.40	+ 0.61	- 1 9.60	+88 46 10.71
		W	...		...	58.10	58.20	24.558	229 41 58.12	+ 8.78	- 0.61	+ 1 9.08	
9	α Aurigæ	W	...	5 9	...	50.00	58.35	25.562	186 50 1.38	+ 8.52	- 0.35	+ 7.25	+45 53 52.63
		E	...		...	51.45	50.15	24.400	172 53 58.95	+ 0.09	+ 0.35	- 7.25	
10	β Tauri	E	...	5 20	...	51.20	50.50	24.520	190 16 2.65	+ 1.58	+ 0.18	+ 10.88	+28 31 24.05
		W	...		...	58.15	58.55	25.279	160 28 0.75	+ 9.57	- 0.18	- 10.88	
11	α Aurigæ	W	...	5 53	...	58.50	57.85	25.506	178 10 3.80	+ 7.99	- 0.25	- 1 7.78	+37 12 26.75
		E	...		...	51.70	50.55	26.059	181 34 6.35	+ 0.43	+ 0.25	+ 1 7.78	
12	March 5, H. α Ursæ Minoris	W	...	1 21	...	54.90	55.90	24.612	229 41 59.15	+ 6.34	- 0.61	+ 1 9.58	+88 46 11.18
		E	...		...	49.00	49.70	25.450	130 2 0.15	- 0.14	+ 0.61	- 1 9.60	
13	β Tauri	W	...	5 20	...	57.85	58.05	25.320	160 28 3.40	+ 5.69	- 0.18	- 10.91	+28 31 24.26
		E	...		...	52.50	52.65	24.511	190 16 4.05	- 0.08	+ 0.18	+ 10.91	
14	γ Orionis	E	...	5 31	...	52.80	52.00	25.770	220 2 6.08	+ 1.68	- 0.01	+ 50.16	1 16 5.43
		W	...		...	57.95	58.05	24.149	130 42 3.28	+ 7.21	+ 0.01	- 50.15	
15	δ Ursæ Minoris s. p.	E	...	6 5	...	51.90	52.10	23.676	125 26 2.48	- 0.11	- 0.22	- 1 23.00	+86 36 24.65
		W	...		...	57.50	58.35	26.211	234 18 3.60	+ 6.22	+ 0.22	+ 1 23.06	
16	α Cygni	E	...	20 38	...	47.40	46.30	25.970	173 52 2.42	+ 0.73	+ 0.34	- 0.23	+44 54 40.83
		W	...		...	55.25	54.80	23.993	185 52 4.38	+ 9.47	- 0.34	+ 6.23	
17	March 7, H. α Aurigæ	W	...	5 9	...	50.60	48.65	25.530	186 50 3.92	+ 4.85	- 0.35	+ 7.15	+45 53 52.64
		E	...		...	46.45	43.25	24.243	172 54 3.00	- 0.21	+ 0.35	- 7.15	
18	β Tauri	E	...	5 20	...	46.35	43.45	24.531	190 16 3.90	+ 1.29	+ 0.18	+ 10.73	+28 31 24.76
		W	...		...	51.00	48.95	25.377	169 28 1.78	+ 7.05	- 0.18	- 10.73	

Time	Ther- globe	Air ther	Barom.	Observation made at IX with movable thread, except as noted below.	No	Zenith point.	Red. to 1898.0.
20 26	44.0	46.0	29.746	Observation assumed as at IV.	1	179 52 4.14	
20 28	41.1	48.0	29.846	Observation assumed as at VI.	2	4.49	
20 30	41.2	35.2	29.856	6, 16, 14, 16, 18. Observation at I.	3	2.28	
20 32	41.0	37.9	29.714	7, 8. Observation at IV.	4	1.61	
20 34	41.1	41.2	29.666		5	3.76	
20 36	40.2	38.5	29.738		6	4.10	
20 38	37.9	36.5	29.746		7	4.44	
20 40	42.9	42.0	29.936		8	1.28	
20 42	40.5	40.0	29.991		9	3.70	
20 44	40.1			Notes. Unsteady.	10	1.18	
20 46	39.1			Pair	11	2.24	
20 48	44.2	41.0	10.044	Post.	12	4.01	
20 50	41.0		10.166	Rain; clouds.	13	1.49	
20 52	42.0				14	7.60	
20 54	41.0				15	1.28	
20 56	41.5	41.0	10.168		16	7.12	
20 58	41.0		10.167		17	1.14	
21 00	42.8	42.8	10.164		18	6.13	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Orionis	W E	...	5 31	...	51. 10 46. 05	49. 10 43. 30	24. 252 25. 851	139 41 59. 22 220 2 2. 80	+ 5. 36 - 0. 43	+ 0. 01 - 0. 01	- 49. 42 + 49. 43	- 1 16 4. 39
2	δ Ursæ Minoris S. P.	W E	...	6 5	...	51. 70 46. 15	48. 75 42. 85	26. 275 23. 792	234 18 2. 78 125 25 57. 22	+ 6. 42 + 0. 29	+ 0. 22 - 0. 22	+ 1 21. 87 - 1 21. 87	+ 86 36 24. 79
3	March 8, H. α Ursæ Minoris	E W	...	1 21	...	45. 95 53. 85	44. 10 53. 20	25. 592 24. 593	130 1 59. 05 229 42 0. 55	+ 0. 14 + 9. 20	+ 0. 61 - 0. 61	- 1 8. 14 + 1 8. 16	+ 88 46 8. 99
4	δ Ursæ Minoris S. P.	W E	...	6 5	...	50. 00 50. 05	55. 25 48. 80	26. 349 23. 730	234 18 2. 92 125 26 0. 58	+ 6. 77 + 0. 14	+ 0. 22 - 0. 22	+ 1 21. 28 - 1 21. 28	+ 86 36 23. 97
5	March 9, H. α Ursæ Minoris	W E	...	1 21	...	49. 05 44. 35	53. 90 48. 55	25. 520 26. 428	229 41 58. 42 130 1 55. 68	+ 5. 22 - 0. 11	- 0. 61 + 0. 61	+ 1 8. 17 - 1 8. 17	+ 88 46 9. 64
6	α Aurigæ	E W	...	5 9	...	45. 45 49. 55	50. 15 55. 00	24. 971 26. 312	172 54 3. 00 186 50 4. 50	+ 1. 06 + 5. 83	+ 0. 35 - 0. 35	- 7. 06 + 7. 06	+ 45 53 53. 81
7	β Tauri	W E	...	5 20	...	50. 40 45. 50	55. 70 50. 10	26. 020 25. 193	169 28 3. 02 190 16 2. 82	+ 5. 21 + 0. 39	- 0. 18 + 0. 18	- 10. 60 + 10. 60	+ 28 31 25. 59
8	θ Aurigæ	E W	...	5 53	...	45. 05 50. 45	50. 00 55. 60	26. 815 24. 469	181 34 4. 50 178 10 0. 85	+ 0. 75 + 6. 65	+ 0. 25 - 0. 25	+ 1. 73 - 1. 73	+ 37 12 27. 81
9	δ Ursæ Minoris S. P.	E W	...	6 5	...	45. 05 50. 00	50. 35 55. 50	24. 385 27. 039	125 26 0. 15 234 18 2. 28	+ 0. 05 + 5. 46	- 0. 22 + 0. 22	- 1 20. 87 + 1 20. 87	+ 86 36 24. 39
10	March 12, H. θ Aurigæ	W E	...	5 53	...	50. 50 47. 00	54. 45 50. 95	24. 465 26. 857	178 10 0. 85 181 34 0. 48	+ 3. 13 - 0. 63	- 0. 25 + 0. 25	- 1. 67 + 1. 67	+ 37 12 27. 89
11	δ Ursæ Minoris S. P.	E W	...	6 5	...	47. 00 49. 50	50. 90 54. 05	27. 265 27. 180	125 23 55. 98 234 17 58. 98	- 0. 07 + 2. 92	- 0. 22 + 0. 22	- 1 17. 98 + 1 17. 98	+ 86 36 23. 96
12	51 H. Cephei	W E	...	6 53	...	50. 05 47. 50	54. 10 50. 85	26. 385 25. 008	228 7 57. 50 131 35 58. 65	+ 3. 28 + 0. 20	- 0. 27 + 0. 27	+ 1 2. 72 - 1 2. 73	+ 87 12 48. 12
13	March 13, H. θ Aurigæ	E W	...	5 53	...	47. 70 50. 00	50. 95 53. 20	26. 889 24. 560	181 33 59. 45 178 9 58. 18	+ 0. 91 + 3. 37	+ 0. 25 - 0. 25	+ 1. 68 - 1. 68	+ 37 12 27. 70
14	51 H. Cephei	E W	...	6 53	...	48. 25 50. 00	51. 10 53. 80	28. 069 26. 451	131 33 55. 55 228 7 55. 22	+ 0. 72 + 3. 06	+ 0. 27 - 0. 27	- 1 3. 11 + 1 3. 11	+ 87 12 47. 38
15	March 14, H. α Ursæ Minoris	E W	...	1 21	...	49. 50 50. 55	47. 15 44. 75	26. 092 25. 121	130 2 1. 42 229 42 1. 38	+ 0. 14 + 7. 98	+ 0. 61 - 0. 61	- 1 7. 59 + 1 7. 59	+ 88 46 7. 64
16	θ Aurigæ	W E	...	5 53	...	54. 65 48. 95	54. 60 48. 00	24. 380 26. 802	178 10 5. 65 181 34 5. 02	+ 6. 15 - 0. 41	- 0. 25 + 0. 25	- 1. 72 + 1. 72	+ 37 12 28. 76
17	51 H. Cephei	W E	...	6 53	...	55. 15 49. 35	54. 80 48. 65	26. 216 28. 016	228 8 5. 00 131 34 4. 75	+ 7. 14 + 0. 74	- 0. 27 + 0. 27	+ 1 4. 64 - 1 4. 64	+ 87 12 47. 53
18	March 17, H. α Ursæ Minoris	E W	...	1 21	...	46. 35 48. 50	49. 70 53. 55	26. 053 25. 254	130 2 3. 02 229 42 3. 42	+ 0. 14 + 3. 26	+ 0. 61 - 0. 61	- 1 5. 34 + 1 5. 35	+ 88 46 6. 76

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.					No.	Zenith point.	Red. to 1898.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>							<i>° ' "</i>	<i>"</i>
7 5 30	48. 4	50. 0*	30. 146	2, 3, 4.	Observation at IV.				1	179 52	5. 58
7 6 46	47. 9	48. 0†	30. 140	5, 9, 11, 12, 17.	Observation assumed as at VI.				2		4. 73
8 1 29	55. 9	53. 0	30. 100	6, 8, 13.	Observation at I.				3		8. 26
8 6 25	49. 9	50. 5	30. 050	14, 15, 18.	Observation assumed as at IV.				4		6. 80
9 1 4	54. 9	55. 0	30. 046						5		39. 37
4 50	53. 9	55. 0	30. 013						6		33. 38
5 20	53. 5	...	...						7		30. 10
5 51	52. 8	...	...						8		32. 00
6 10	52. 4	57. 0	30. 048						9		33. 04
12 5 10	66. 1	67. 0	29. 798	3.	Unsteady.				10		28. 91
6 5	66. 1	...	...	4, 11.	Fair.				11		29. 68
6 10	64. 9	66. 0	29. 806	5 W.	Micrometer reading increased 1 r. v.				12		28. 26
13 5 10	61. 9	65. 0	29. 716	15, 16.	Poor and unsteady.				13		30. 54
7 25	60. 5	68. 0	29. 716	*	Thermometer reading increased 5°.				14		29. 56
14 1 6	57. 6	58. 0	29. 961	†	Thermometer reading increased 10°.				15		30. 24
4 40	...	59. 5	29. 966						16		32. 34
5 53	54. 9	...	...						17		35. 23
7 20	59. 9	58. 0	29. 001						18		31. 60
17 1 5	71. 4	61. 0	29. 764								

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	δ Ursæ Minoris S. P.	W		6 5		48.40	53.05	27.121	234 18 2.68	+ 3.28	+ 0.22	+ 1 18.22	+86 36 24.57
		E				46.90	51.30	24.210	125 20 2.45	+ 1.56	- 0.22	- 1 18.22	
2	51 H. Cephei	E		6 53		45.45	50.45	27.966	131 34 4.42	+ 0.29	+ 0.27	+ 1 3.05	+87 12 46.13
		W				48.10	53.45	26.272	228 8 4.12	+ 3.29	- 0.27	- 1 3.05	
3	λ Ursæ Minoris S. P.	W		7 24		48.60	53.70	26.710	231 50 3.72	+ 3.72	+ 0.73	+ 1 12.36	+88 58 44.88
		E				45.00	50.25	24.596	127 48 2.95	+ 0.28	- 0.73	- 1 12.36	
4	α Cygni	W		20 38		50.25	53.70	24.682	185 52 4.00	+ 3.19	- 0.34	- 6.09	+44 54 45.17
	March 19, H.	E				46.85	49.75	26.595	173 52 4.12	- 0.73	+ 0.34	+ 6.09	
5	α Aurigæ	E		5 9		47.55	49.40	24.815	172 54 4.82	+ 3.96	+ 0.35	- 6.67	+45 53 54.05
		W				45.60	46.50	26.390	186 50 5.35	+ 1.41	- 0.35	+ 6.67	
6	β Tauri	W		5 20		45.40	45.95	26.132	169 28 4.00	- 0.43	- 0.18	- 10.00	+28 31 24.41
		E				47.50	49.05	25.160	190 16 4.95	+ 2.30	+ 0.18	+ 10.00	
7	δ Ursæ Minoris S. P.	E		6 5		48.05	49.55	24.205	125 25 59.95	+ 3.46	- 0.22	- 1 10.33	+86 36 24.78
		W				45.70	47.60	24.205	234 20 6.45	+ 1.13	+ 0.22	+ 1 10.33	
8	51 H. Cephei	W		6 53		47.00	48.20	26.426	228 8 1.95	+ 2.18	- 0.27	+ 1 1.45	+87 12 48.03
	March 31, H.	E				47.05	48.20	27.905	131 34 1.00	+ 2.22	+ 0.27	- 1 1.46	
9	α Cygni	W		20 38		44.00	51.55	24.710	185 52 1.58	+ 5.11	- 0.34	+ 6.28	+44 54 44.42
		E				39.10	45.45	26.687	173 52 2.95	- 0.73	+ 0.34	- 6.28	
10	α Cassiopeizæ	W		0 35		51.90	57.95	24.497	196 50 0.32	+ 6.81	- 0.50	+ 17.97	+55 58 47.22
		E				45.55	50.30	27.011	162 47 58.82	- 0.64	+ 0.50	- 17.97	
11	β Andromedæ	W		1 4		52.35	58.55	25.080	176 2 2.02	+ 7.36	- 0.23	- 3.93	+35 4 51.70
		E				45.40	50.50	26.328	183 42 0.88	- 0.63	+ 0.23	+ 3.93	
12	α Cygni	W		20 38		55.00	56.60	24.745	185 51 50.52	+ 6.05	- 0.34	+ 6.17	+44 54 43.54
	April 2, H.	E				49.05	49.85	26.857	173 51 57.82	- 0.73	+ 0.34	- 6.17	
13	α Cygni	E		20 38		51.00	51.85	26.697	173 51 50.38	+ 0.73	+ 0.34	- 6.22	+44 54 43.11
		W				54.50	55.95	24.588	185 52 2.70	+ 4.77	- 0.34	+ 6.21	
14	α Cygni	E		20 38		47.85	52.55	27.226	173 51 57.02	+ 7.08	+ 0.34	- 5.94	+44 54 52.16
	June 6, H.	W				42.25	46.25	25.900	185 51 56.80	+ 0.73	- 0.34	+ 5.94	
15	11 Bootis	E		13 57		57.80	61.05	27.085	190 53 58.25	+ 11.97	+ 0.18	+ 10.79	+27 52 37.25
		W				49.55	51.75	25.896	168 49 59.15	+ 2.61	- 0.18	- 10.79	
16	Groombridge 2109	E		14 21		57.20	60.55	26.571	179 55 57.68	+ 11.38	+ 0.27	+ 0.07	+38 51 8.20
		W				50.00	52.10	26.350	179 47 58.65	+ 3.05	- 0.27	- 0.07	
17	Piazzi 235	W		14 53		48.55	51.20	25.570	190 59 57.40	+ 0.29	- 0.40	+ 10.92	+50 2 39.75
		E				50.70	60.15	27.708	168 43 55.08	+ 0.43	+ 0.40	- 10.92	

Time	Ther- 1892.	Att ther	Barom	Observation made at IX with movable thread, except as noted below.		No.	Zenith point	Red. to 1898 c.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>m</i>					
17 5 17	66.2	64.5	29.880	1.2.3.	Observation assumed as at IV.	1	179 52 17.17	
17 5 11	61.8			5.14.14.15.16.	Observation at I.	2	179 52 17.65	
17 5 17	61.4	61.0	29.960	7.8.	Observation assumed as at VI.	3	179 52 17.18	
17 5 11	51.4	51.0	29.960			4	179 52 17.15	
17 5 10	76.3	71.0	29.669			5	179 52 17.17	
17 5 10	76.3					6	179 52 17.17	
17 5 10	74.8					7	179 52 17.14	
17 5 10	74.6	71.5	29.646			8	179 52 17.10	
17 5 10	74.2	71.0	29.640			9	179 52 17.08	
17 5 10	47.9	47.6	29.977			10	179 52 17.44	
17 5 10	47.5	47.1	29.979	1.6. Fair		11	179 52 17.50	
17 5 10	41.9	41.0	29.965	Micro-meter reading decreased 1 rev.		12	179 52 17.04	
17 5 10	37.0	37.0	29.960	1.6. Fair		13	179 52 17.03	
17 5 10	61.9	61.5	29.944	Thermometer reading decreased 10°.		14	179 52 17.54	
17 5 10	71.0	71.0	29.948			15	179 52 17.56	
17 5 10	71.4					16	179 52 17.62	+6.46
17 5 10	72.8					17	179 52 17.48	+4.94
17 5 10	71.1	70.8	29.940					

Notes.

1. 6. Bar-
Micrometer reading decreased 1 rev.
1. 10. Therm-
Thermometer reading decreased 10°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
	June 8, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	12 Canum Venat.	E	...	12 51	...	58.40	61.65	25.205	179 55 55.58	+12.80	+0.27	+0.05	+38 52 4.74
		W	...			48.45	50.55	27.839	179 47 55.92	+1.56	-0.27	-0.05	
2	June 10, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	Groombridge 2109	E	...	14 21	...	51.95	52.55	26.476	179 56 2.80	+11.00	+0.27	+0.07	+38 51 7.63
		W	...			42.05	41.50	26.321	179 48 2.38	+1.07	-0.27	-0.07	
3	Piazzi 235	W	...	14 53	...	42.50	41.10	25.488	191 0 3.62	-0.67	-0.40	+10.80	+50 2 41.33
		E	...			51.05	51.70	27.532	168 44 1.25	+9.85	+0.40	-10.80	
4	June 22, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	α Ursæ Minoris s. p.	E	...	13 22	...	58.10	64.10	27.720	127 34 5.28	+12.14	-0.61	-11.07	+88 45 45.07
		W	...			47.30	51.90	27.328	232 10 6.52	-0.14	+0.61	+11.07	
5	July 7, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	α Boötis	W	...	14 11	...	47.30	48.45	26.968	160 40 8.65	-0.58	-0.12	-18.89	+19 42 41.92
		E	...			57.35	60.40	27.427	199 4 9.92	+11.13	+0.12	+18.89	
6	ϵ Boötis	W	...	14 41	...	49.05	50.60	28.881	168 26 10.20	+1.49	-0.18	-10.91	+27 30 11.01
		E	...			58.05	61.45	28.385	191 16 9.28	+12.05	+0.18	+10.91	
7	July 8, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	α Draconis	W	...	14 2	...	48.85	50.80	27.613	205 48 4.20	-0.67	-0.73	+26.16	+64 51 50.71
		E	...			58.15	61.60	26.889	153 56 6.12	+10.04	+0.73	-26.16	
8	α Boötis	W	...	14 11	...	49.35	51.35	26.879	160 40 9.55	-0.11	-0.12	-18.74	+19 42 40.70
		E	...			57.05	61.35	27.439	199 4 11.40	+9.63	+0.12	+18.74	
9	ϵ Boötis	W	...	14 41	...	49.75	52.00	28.862	168 26 10.80	+0.44	-0.18	-10.89	+27 30 12.38
		E	...			58.00	61.30	28.324	191 16 10.10	+9.81	+0.18	+10.89	
10	July 15, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	α Coronæ Borealis	W	...	15 30	...	48.70	50.10	27.802	168 0 13.70	-0.73	-0.17	-11.29	+27 3 27.93
		E	...			59.80	63.00	26.414	191 44 12.45	+12.05	+0.17	+11.29	
11	α Serpentis	E	...	15 39	...	60.15	63.65	26.930	212 2 12.45	+14.04	+0.04	+33.84	+6 44 41.44
		W	...			50.00	51.15	27.142	147 42 12.80	+2.01	-0.04	-33.84	
12	δ Draconis	E	...	16 28	...	60.85	63.95	27.387	149 48 11.18	+14.59	+0.87	-31.27	+68 59 25.84
		W	...			50.50	52.20	26.611	209 56 11.88	+2.81	-0.87	+31.27	
13	July 18, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	ϵ Serpentis	E	...	15 46	...	61.05	63.95	29.462	213 58 8.82	+10.92	+0.03	+36.42	+4 47 0.57
		W	...			53.25	54.35	27.860	145 44 3.88	+1.68	-0.03	-36.42	
14	ϕ Herculis	W	...	16 6	...	52.35	53.60	28.499	186 8 8.12	-0.67	-0.34	+5.92	+45 12 11.37
		E	...			61.10	64.20	25.842	173 36 8.40	+9.61	+0.34	-5.92	
15	η Ursæ Minoris	W	...	16 20	...	52.30	53.70	26.750	216 56 6.78	-0.66	-1.34	+40.69	+75 59 32.02
		E	...			62.10	64.90	27.755	142 48 2.85	+10.54	+1.34	-40.69	
16	July 20, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
	δ Herculis	W	...	16 58	...	52.60	48.15	27.173	174 40 2.95	-0.58	-0.22	-4.95	+33 42 58.90
		E	...			60.10	57.00	27.527	185 4 4.88	+8.55	+0.22	+4.95	
17	α Herculis (<i>brighter</i>)	W	...	17 10	...	52.95	49.00	26.778	155 28 1.72	+0.03	-0.08	-24.69	+14 30 25.34
		E	...			60.55	57.70	27.819	204 16 3.92	+8.73	+0.08	+24.69	
18	β Draconis	E	...	17 28	...	60.75	58.15	28.121	166 24 8.75	+10.52	+0.43	-13.03	+52 22 43.82
		W	...			53.45	49.20	29.037	193 18 8.80	+1.89	-0.43	+13.03	

Time	Ther. 3882	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red to 1808.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	
8 12 45	80.2	81.0	29.806	1, 2, 11, 12, 14, 18. Observation at I.	1	179 53 5.08	
10 12 25	...	82.0	29.916	4. Observation assumed as at VI.	2	0.20	
14 21	78.1	...	...		3	8.68	5.91
15 14	76.7	75.2	29.934		4	54.98	4.26
22 12 50	74.8	71.9	29.876		5	44.30	
7 14 5	84.9	80.0*	29.910		6	44.87	
15 8	85.9	80.5*	29.950		7	41.76	
8 13 55	85.9	77.6	29.820		8	43.40	
14 11	85.8	...	...		9	42.30	
14 40	84.7	77.1	29.816		10	44.82	
15 15 15	85.9	82.0	29.806		11	43.79	
15 49	85.2	...	...		12	41.86	
16 15	81.2	79.0	29.806		13	42.15	
18 15 16	87.0	86.0	29.891		14	41.36	5.23
18 58	86.6	85.0	29.886		15	43.74	5.93
16 20	85.6	...	...		16	44.88	
20 16 40	82.1	78.9	29.946		17	41.06	
17 16	81.8	...	...		18	41.11	
17 20	81.4	82.0	29.910				

Note.
* Thermometer reading increased 10°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
	July 23, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	β Boötis	W		14 58		53.05	48.35	27.963	181 43 56.55	- 0.28	- 0.29	+ 1.78	+40 47 34.57
		E				60.95	57.55	26.759	178 0 4.12	+ 8.83	+ 0.29	- 1.78	
2	α Coronæ Borealis	E		15 30		61.45	58.45	26.621	191 44 3.35	+ 11.03	+ 0.17	+ 11.44	+27 3 28.92
		W				54.10	48.70	27.849	168 0 9.68	+ 1.97	- 0.17	- 11.44	
3	α Serpentis	W		15 30		53.60	49.10	27.408	147 42 5.72	+ 0.41	- 0.04	- 34.29	+ 6 44 41.59
		E				61.50	58.45	24.230	212 4 7.78	+ 9.59	+ 0.04	+ 34.29	
4	ϵ Coronæ Borealis	E		15 53		62.40	58.40	28.452	191 35 52.40	+ 11.56	+ 0.17	+ 11.37	+27 10 23.87
		W				54.25	49.00	26.458	168 8 0.32	+ 2.21	- 0.17	- 11.37	
5	δ Ophiuchi	W		16 9		54.00	49.00	29.600	137 30 6.42	+ 0.89	+ 0.02	- 49.83	- 3 26 1.07
		E				62.00	58.60	25.073	222 13 59.55	+ 9.96	- 0.02	+ 49.84	
6	η Draconis	E		16 23		62.90	59.40	28.583	157 2 1.22	+ 12.34	+ 0.62	- 23.07	+61 44 47.43
		W				54.00	49.05	26.100	202 42 8.88	+ 2.37	- 0.62	+ 23.07	
7	July 28, H. α Serpentis	W		15 30		52.95	47.25	27.410	147 42 7.28	- 0.68	- 0.04	- 33.88	+ 6 44 43.22
		E				62.50	58.50	24.281	212 4 3.38	+ 10.39	+ 0.04	+ 33.88	
8	ϵ Coronæ Borealis	E		15 53		63.10	58.80	28.310	191 35 56.60	+ 12.35	+ 0.17	+ 11.21	+27 10 24.68
		W				54.55	48.05	26.522	168 7 58.30	+ 2.11	- 0.17	- 11.21	
9	η Draconis	E		16 23		63.65	59.25	28.613	157 1 55.30	+ 12.89	+ 0.62	- 22.73	+61 44 49.14
		W				54.95	49.05	26.190	202 42 4.68	+ 2.83	- 0.62	+ 22.74	
10	κ Ophiuchi	E		16 53		63.35	58.95	25.490	209 15 56.85	+ 12.57	+ 0.06	+ 30.45	+ 9 32 1.28
		W				55.70	49.70	29.320	150 27 59.70	+ 3.59	- 0.06	- 30.45	
11	July 29, H. α Coronæ Borealis	W		15 30		44.80	48.85	27.073	168 0 7.88	- 0.11	- 0.17	- 11.12	+27 3 27.92
		E				53.10	50.30	26.641	191 44 7.58	+ 9.84	+ 0.17	+ 11.13	
12	α Serpentis	E		15 30		53.40	59.95	27.182	212 2 7.40	+ 11.79	+ 0.04	+ 33.33	+ 6 44 42.42
		W				45.60	50.90	27.467	147 42 2.05	+ 2.81	- 0.04	- 33.33	
13	ϵ Coronæ Borealis	W		15 53		44.75	49.70	26.408	168 8 7.32	+ 0.27	- 0.17	- 11.05	+27 10 24.72
		E				53.00	50.35	28.316	191 36 1.65	+ 0.81	+ 0.17	+ 11.05	
14	δ Ophiuchi	E		16 9		54.00	60.15	24.930	222 14 8.18	+ 12.25	- 0.02	+ 48.54	- 3 26 1.59
		W				46.20	51.25	29.872	137 29 55.42	+ 3.34	+ 0.02	- 48.53	
15	λ Ophiuchi	W		16 53		45.05	51.50	26.368	150 30 4.02	+ 1.67	- 0.06	- 30.12	+ 9 32 1.32
		E				53.10	59.75	25.648	209 15 55.72	+ 10.06	+ 0.06	- 30.12	
16	July 30, H. ϵ Serpentis	W		15 46		44.50	49.95	28.110	145 43 58.08	- 0.54	- 0.03	- 36.02	+ 4 47 0.04
		E				51.55	58.05	26.809	214 0 4.62	+ 7.54	+ 0.03	+ 36.02	
17	β Scorpii	W		16 0		46.50	51.25	28.269	121 25 52.00	+ 1.27	+ 0.12	- 1 26.58	-19 31 46.24
		E				52.40	58.05	26.701	238 18 2.50	+ 8.05	- 0.12	+ 1 26.58	
18	γ Ursæ Minoris	W		16 20		45.70	50.85	27.178	216 55 51.82	+ 0.61	- 1.34	+ 40.51	+75 50 31.62
		E				53.60	59.80	27.959	142 47 59.75	+ 9.59	+ 1.34	- 40.51	

Time	Ther- m.	Atm- ther.	Barom.	Observation made at IX with movable thread, except as noted below								No.	Zenith point	Red. to 1898.0
<i>h m s</i>	<i>"</i>	<i>"</i>	<i>mm</i>									<i>"</i>	<i>"</i>	<i>"</i>
21 11 0	81.6	81.9	29.910	2, 4, 6, 8, 9, 10, 12, 14. Observation at 1								1	179 53 41.02	
21 11 1	81.6											2	41 28	
21 11 2	81.6											3	45 18	
21 11 3	81.1											4	43 20	
21 11 4	80.4											5	44 31	
21 11 5	80.6	80.9	29.948									6	48 22	
21 12 0	80.5	80.8	29.710									7	44 72	
21 12 1	80.8											8	43 44	
21 12 2	81.9											9	45 92	
21 12 3	81.1	79.9	29.728									10	44 76	
21 12 4	81.1	81.1	29.781									11	46 80	
21 12 5	81.6											12	45 26	
21 13 0	81.1											13	45 98	
21 13 1	81.1											14	47 64	
21 13 2	81.1	81.1	29.788									15	46 20	
21 13 3	80.9	81.5	29.745									16	45 39	
21 13 4	80.2											17	43 39	
21 13 5	80.2											18	45 78	- 2.81

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	August 1, H. Coronæ Borealis	W E	...	15 30	...	46.30 52.45	50.60 57.85	28.172 26.669	168 0 0.08 191 44 5.90	- 0.73 + 6.40	- 0.17 + 0.17	- 11.28 + 11.28	+27 3 29.60
2	August 3, H. Coronæ Borealis	W E	...	15 53	...	47.45 52.60	51.75 57.80	26.369 28.434	168 8 5.75 191 35 57.75	- 0.43 + 5.53	- 0.17 + 0.17	- 11.05 + 11.05	+27 10 24.48
3	δ Ophiuchi	E W	...	16 9	...	53.10 48.45	58.60 52.85	25.488 26.992	222 13 43.95 137 31 51.82	+ 7.67 + 2.15	- 0.02 + 0.02	+ 48.55 - 48.56	- 3 25 59.82
4	γ Ursæ Minoris	W E	...	16 20	...	47.45 53.35	51.45 58.45	27.203 27.888	216 55 50.58 142 48 1.90	- 0.58 + 6.28	- 1.34 + 1.34	+ 40.25 - 40.25	+75 59 32.68
5	September 3, H. Ursæ Minoris S. P.	W E	...	13 22	...	50.20 52.75	54.75 57.75	29.138 30.750	232 10 8.90 127 33 47.98	+ 0.14 + 3.10	+ 0.61 - 0.61	+ 8.47 - 8.40	+88 45 58.00
6	α Cygni	E W	...	20 38	...	54.25 53.40	58.85 57.05	29.749 32.803	173 52 4.30 185 49 57.50	+ 2.51 + 1.15	+ 0.34 - 0.34	- 5.69 + 5.69	+44 55 20.48
7	September 5, H. Cygni	E W	...	20 38	...	57.00 55.45	51.55 49.55	30.050 33.100	173 51 49.55 185 49 45.62	+ 2.75 + 0.87	+ 0.34 - 0.34	- 5.76 + 5.77	+44 55 21.63
8	September 16, H. Aquilæ	W E	...	19 32	...	50.50 57.90	52.25 58.85	30.577 28.671	133 41 55.32 226 1 50.70	- 0.63 + 5.90	+ 0.04 - 0.04	- 57.21 + 57.21	- 7 15 2.40
9	α Aquilæ	W E	...	19 46	...	50.35 57.05	52.35 58.85	28.449 26.971	149 34 8.48 210 12 6.10	- 0.66 + 5.85	- 0.05 + 0.05	- 32.17 + 32.17	+ 8 36 12.74
10	τ Aquilæ	W E	...	19 59	...	50.55 57.50	52.30 58.60	28.050 27.612	147 57 57.02 211 48 8.72	- 0.59 + 5.95	- 0.04 + 0.04	- 34.31 + 34.31	+ 6 59 42.46
11	α Cygni	W E	...	20 38	...	51.50 58.00	52.70 58.85	32.389 29.083	185 50 2.18 173 52 8.28	- 0.19 + 6.01	- 0.34 + 0.34	+ 5.81 - 5.80	+44 55 23.67
12	220 H ¹ . Draconis	E W	...	20 52	...	58.00 51.05	58.85 53.10	31.319 30.393	138 36 7.42 221 5 53.28	+ 6.88 + 0.90	+ 0.08 - 0.08	- 48.41 + 48.41	+80 10 36.21
13	α Aurigæ	W E	...	5 9	...	50.60 57.80	53.00 59.45	29.793 28.689	186 50 1.35 172 54 10.28	- 0.71 + 5.72	- 0.35 + 0.35	+ 6.86 - 6.87	+45 53 38.22
14	β Tauri	W E	...	5 20	...	51.35 57.45	53.45 59.00	29.572 32.018	169 28 10.22 190 13 56.40	- 0.15 + 5.35	- 0.18 + 0.18	- 10.31 + 10.31	+28 31 20.58
15	β Aurigæ	W E	...	5 52	...	50.85 57.60	53.45 59.15	33.710 30.952	185 49 55.98 173 50 7.82	- 0.37 + 5.49	- 0.34 + 0.34	+ 5.91 - 5.91	+44 56 9.88
16	September 17, H. Aquilæ	W E	...	19 32	...	52.60 58.05	55.15 59.75	30.229 28.189	133 42 10.52 226 2 15.20	- 0.09 + 4.63	+ 0.04 - 0.04	- 56.98 + 56.98	- 7 15 3.16
17	α Aquilæ	W E	...	19 46	...	52.10 57.85	55.00 59.85	28.528 26.862	149 34 12.92 210 12 17.50	- 0.39 + 4.59	- 0.05 + 0.05	- 32.03 + 32.03	+ 8 36 13.99
18	τ Aquilæ	W E	...	19 59	...	52.20 57.45	54.90 59.75	27.710 27.631	147 58 14.30 211 48 13.50	- 0.39 + 4.36	- 0.04 + 0.04	- 34.17 + 34.17	+ 6 59 42.26

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.							No	Zenith point.	Red. to 1898 0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m</i>									<i>° ' "</i>	<i>"</i>
1 15 25	87.7	84.0	29.866	3.6.7. Observation at I.							1	179 53 44.68	...
3 15 45	92.0	88.0	29.816	5.12. Observation at IV.							2	42.38	...
10 9	89.9	...	...								3	43.42	...
16 30	89.8	89.0	29.801								4	43.04	-8.12
1 11 5	94.5	90.0	29.886								5	179 55 21.97	...
20 30	81.7	86.0	29.796								6	19.01	...
5 20 45	75.8	80.0	29.846								7	17.88	...
16 19 17	74.0	76.0	29.815								8	4.51	...
19 46	73.6	...	...								9	0.54	...
19 59	73.2	...	...								10	1.00	...
20 15	72.3	...	...								11	2.38	...
25 30	71.9	72.0	29.820								12	3.38	...
4 48	64.9	67.0	29.884								13	1.50	...
5 20	64.6	...	...								14	2.56	...
6 30	64.8	67.0	...								15	3.82	...
17 19 17	76.8	79.0	29.858	6.15. Poor.							16	7.02	...
19 46	76.6	...	...	18 E. One microscope reading decreased 10".							17	7.37	...
19 59	75.9	...	...								18	4.94	...

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α^2 Capricorni	W		20 11 11.0	1 52.0	52.45	54.60	128 9 29.20	128 9 29.20	+ 0.30	+ 6.60	-1 0.05	-12 51 26.17
		E		20 14 47.0	1 44.0	57.60	60.20	231 40 43.12	231 40 43.12	+ 5.38	- 5.70	+1 9.05	
2	α Cygni	W		20 38		52.05	54.40	32.192	185 50 13.98	- 0.71	- 0.34	+ 5.78	+44 55 23.30
		E				57.95	59.95	29.041	173 52 15.20	+ 4.69	+ 0.34	- 5.78	
3	September 19, H. Aquilæ	W		19 42		53.20	57.90	28.350	151 20 11.82	- 0.35	- 0.06	- 29.77	+10 22 11.41
		E				55.00	59.35	30.049	208 24 12.12	+ 1.17	+ 0.06	+ 29.77	
4	β Aquilæ	W		19 50		53.50	57.90	30.280	147 6 11.65	- 0.21	- 0.03	- 35.23	+ 6 9 24.47
		E				55.05	59.35	28.031	212 38 16.32	+ 1.20	+ 0.03	+ 35.22	
5	α^2 Capricorni	W		20 11 14.0	1 53.0	53.00	58.05	128 9 28.05	128 9 28.05	+ 0.78	+ 6.72	-1 9.50	-12 51 25.00
		E		20 14 50.0	1 43.0	54.70	59.00	231 40 40.12	231 40 40.12	+ 1.00	- 5.50	+1 9.50	
6	α Cygni	W		20 38		52.95	57.55	32.159	185 50 13.32	- 0.63	- 0.34	+ 5.78	+44 55 22.67
		E				54.95	59.40	29.178	173 52 12.42	+ 1.18	+ 0.34	- 5.78	
7	September 23, H. Aquilæ	W		19 32		43.95	51.50	30.305	133 42 8.98	- 0.39	+ 0.04	- 50.56	- 7 15 3.23
		E				52.80	59.40	28.342	226 2 8.35	+ 7.49	- 0.04	+ 50.56	
8	α Aquilæ	W		19 46		44.15	51.70	28.602	149 34 12.75	- 0.21	- 0.05	- 31.82	+ 8 36 14.94
		E				52.80	58.95	26.902	210 12 14.70	+ 7.28	+ 0.05	+ 31.83	
9	γ Aquilæ	W		19 59		44.35	51.80	27.844	147 58 12.40	- 0.07	- 0.04	- 33.91	+ 6 59 42.80
		E				52.50	58.65	27.621	211 48 14.58	+ 6.99	+ 0.04	+ 33.91	
10	α^2 Capricorni	W		20 11 18.0	1 52.0	44.90	52.45	128 9 31.08	128 9 31.08	+ 1.24	+ 6.60	-1 9.07	-12 51 25.18
		E		20 14 59.5	1 49.5	53.10	59.20	231 40 42.85	231 40 42.85	+ 8.26	- 6.31	+1 9.07	
11	α Cygni	W		20 38		44.60	51.85	32.349	185 50 13.58	+ 0.07	- 0.34	+ 5.74	+44 55 25.33
		E				52.90	59.00	29.027	173 52 15.78	+ 7.35	+ 0.34	- 5.74	
12	α Aurigæ	W		5 9		44.65	52.05	29.768	186 50 12.20	- 0.56	- 0.35	+ 6.79	+45 53 39.75
		E				51.95	58.85	28.791	172 54 12.50	+ 6.09	+ 0.35	- 6.79	
13	β Tauri	W		5 20		45.05	52.30	29.654	169 28 12.10	- 0.25	- 0.18	- 10.17	+28 31 19.76
		E				51.80	58.40	31.785	190 14 12.45	+ 5.80	+ 0.18	+ 10.17	
14	September 24, H. Ophiuchi	W		17 30		51.40	47.90	28.389	153 36 12.52	- 0.73	- 0.07	- 27.12	+12 38 10.40
		E				59.25	54.95	30.109	206 8 13.75	+ 6.20	+ 0.07	+ 27.12	
15	α Aquilæ	W		19 32		53.40	49.60	30.295	133 42 10.55	- 0.39	+ 0.04	- 57.93	- 7 15 3.34
		E				59.35	54.90	28.231	226 2 14.08	+ 4.91	- 0.04	+ 57.93	
16	γ Aquilæ	W		19 42		53.70	49.65	28.465	151 20 10.88	- 0.23	- 0.06	- 30.28	+10 22 11.28
		E				59.00	55.00	30.047	208 24 11.40	+ 5.07	+ 0.06	+ 30.28	
17	β Aquilæ	W		19 50		54.00	49.75	30.302	147 6 10.68	- 0.05	- 0.03	- 35.82	+ 6 9 24.10
		E				59.90	54.95	28.045	212 38 13.82	+ 5.19	+ 0.03	+ 35.82	
18	γ Aquilæ	W		19 50		53.95	50.00	27.850	147 58 12.18	- 0.05	- 0.04	- 34.60	+ 6 59 43.56
		E				59.95	54.95	27.630	211 48 13.05	+ 5.21	+ 0.04	+ 34.60	
19	α^2 Capricorni	W		20 11 26.5	1 44.4	54.00	49.95	128 9 31.02	128 9 31.02	+ 0.78	+ 5.74	-1 10.05	-12 51 26.36
		E		20 15 2.0	1 51.1	60.00	54.90	231 40 44.05	231 40 44.05	+ 5.94	- 6.50	+1 10.05	

Time	Ther. (88)	Alt. ther.	Barom.	Observation made at IX with movable thread, except as noted below	No.	Zenith point	Red. to 1898.0
<i>h m</i>	<i>°</i>	<i>°</i>	<i>in</i>				
1 10 11	75.0			Observation at V with fixed thread.	1	129 08	9.43
1 10 21	74.8	74.9	29.850		2	129 08	9.43
1 10 30	75.4	75.5	29.847		3	129 08	9.43
1 10 39	75.6				4	129 08	9.43
1 10 48	75.8				5	129 08	9.43
1 10 57	75.5	75.6	29.846		6	129 08	9.43
1 11 13	74.6	75.1	29.850		7	129 08	9.43
1 11 27	74.6				8	129 08	9.43
1 11 36	74.6				9	129 08	9.43
1 11 45	74.7				10	129 08	9.43
1 11 54	74.7	74.9	29.852		11	129 08	9.43
1 12 03	74.6	74.6	29.858		12	129 08	9.43
1 12 12	74.6	74.6	29.859		13	129 08	9.43
1 12 21	74.6	74.6	29.859		14	129 08	9.43
1 12 30	74.6	74.6	29.859		15	129 08	9.43
1 12 39	74.6	74.6	29.859		16	129 08	9.43
1 12 48	74.6	74.6	29.859		17	129 08	9.43
1 12 57	74.6	74.6	29.859		18	129 08	9.43
1 13 06	74.6	74.6	29.859		19	129 08	9.43

Note

1 E. 16 E. 17 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W	...	20 38	...	53.60	49.40	29.378	185 52 13.40	- 0.40	- 0.34	+ 5.86	+44 55 25.36
	September 26, H.	E	...	...	...	60.00	54.85	29.088	173 52 13.05	+ 5.18	+ 0.34	- 5.86	
2	τ Aquilæ	W	...	19 59	...	49.85	50.95	27.802	147 58 11.82	- 0.73	- 0.04	- 33.79	+ 6 59 43.34
		E	...	...	...	55.05	55.75	27.582	211 48 15.12	+ 4.26	+ 0.04	+ 33.79	
3	β Tauri	W	...	5 20	...	54.05	50.45	29.630	169 28 12.32	- 0.54	- 0.18	- 10.23	+28 31 20.36
		E	...	...	...	59.60	55.25	31.762	190 14 12.80	+ 4.05	+ 0.18	+ 10.22	
4	ϵ Orionis	W	...	5 31	...	55.35	50.05	31.868	139 40 8.80	- 0.41	+ 0.01	- 47.00	1 15 48.18
		E	...	...	...	60.15	54.75	29.572	220 2 14.08	+ 4.07	- 0.01	+ 47.00	
5	α Orionis	W	...	5 50	...	54.95	50.15	30.348	148 20 12.62	- 0.54	- 0.04	- 34.21	+ 7 23 26.26
		E	...	...	...	59.60	54.65	28.078	211 24 13.62	+ 3.77	+ 0.04	+ 34.21	
6	δ Ursæ Minoris S. P.	E	...	6 2 29.0	3 4.5	59.60	55.15	...	125 28 44.25	+ 4.45	- 1.10	- 17.88	+86 37 2.82
		W	...	6 8 36.0	3 2.5	55.00	50.90	...	234 21 31.20	+ 0.28	+ 1.07	+ 17.88	
7	α Canis Majoris	W	...	6 39 31.0	1 54.9	55.20	51.10	...	124 26 45.20	+ 0.76	+ 6.52	- 1 21.15	-16 34 21.66
	September 27, H.	E	...	6 43 29.0	2 3.1	59.55	55.00	...	235 23 29.98	+ 4.64	- 7.48	+ 1 21.15	
8	β Cygni	W	...	19 27	...	55.15	51.20	29.183	168 42 14.30	- 0.47	- 0.18	- 11.06	+27 45 5.30
		E	...	...	...	56.75	52.70	29.202	191 2 12.62	+ 0.99	+ 0.18	+ 11.06	
9	δ Cygni	W	...	19 42	...	57.55	52.80	29.062	185 50 14.78	+ 1.41	- 0.34	+ 5.86	+44 53 19.92
		E	...	...	...	58.05	53.00	26.204	173 56 16.00	+ 1.74	+ 0.34	- 5.86	
10	α^2 Capricorni	W	...	20 11 33.0	1 39.4	56.70	51.95	...	128 9 32.98	+ 1.34	+ 5.20	- 11.17	-12 51 24.40
		E	...	20 15 14.0	2 1.6	57.10	52.90	...	231 40 45.40	+ 1.98	- 7.78	+ 11.20	
11	α Cygni	W	...	20 38	...	55.45	51.05	29.265	185 52 13.50	- 0.40	- 0.34	+ 5.92	+44 55 24.14
	September 28, H.	E	...	...	...	58.10	53.15	29.090	173 52 14.95	+ 1.83	+ 0.34	- 5.92	
12	α Ophiuchi	W	...	17 30	...	46.85	47.45	28.349	153 36 11.62	- 0.41	- 0.07	- 27.10	+12 38 10.28
		E	...	...	...	50.95	51.85	30.187	206 8 11.28	+ 3.59	+ 0.07	+ 27.10	
13	β Cygni	W	...	19 27	...	48.75	48.85	29.175	168 42 14.05	+ 1.13	- 0.18	- 11.02	+27 45 3.83
		E	...	...	...	51.40	51.40	29.191	191 2 14.50	+ 3.59	+ 0.18	+ 11.03	
14	γ Aquilæ	W	...	19 42	...	48.80	48.85	28.420	151 20 10.58	+ 1.15	- 0.06	- 30.40	+10 22 10.58
		E	...	...	...	51.80	51.45	30.095	208 24 11.12	+ 3.79	+ 0.06	+ 30.40	
15	β Aquilæ	W	...	19 50	...	49.25	49.20	30.338	147 6 11.60	+ 1.53	- 0.03	- 35.96	+ 6 9 24.46
		E	...	...	...	51.45	51.55	28.119	212 38 12.80	+ 3.68	+ 0.03	+ 35.97	
16	θ Aquilæ	W	...	20 6	...	49.60	49.05	29.672	139 50 14.70	+ 1.62	+ 0.01	- 47.01	- 1 7 10.38
		E	...	...	...	51.35	51.30	28.601	219 54 16.95	+ 3.51	- 0.01	+ 47.01	
17	γ Cygni	W	...	20 19	...	49.35	48.90	30.558	180 52 14.58	+ 1.43	- 0.28	+ 0.99	+30 56 14.94
		E	...	...	...	52.35	51.55	27.719	178 52 13.02	+ 4.09	+ 0.28	- 0.99	
18	α Cygni	W	...	20 38	...	50.50	49.35	29.290	185 52 13.42	+ 2.18	- 0.34	+ 5.90	+44 55 24.35
		E	...	...	...	51.90	51.30	29.139	173 52 14.05	+ 3.77	+ 0.34	- 5.90	
19	β Orionis	W	...	5 10	...	48.95	49.80	30.611	132 38 8.02	- 0.44	+ 0.04	- 1.74	- 8 18 53.56
		E	...	...	...	49.85	50.85	28.042	227 6 9.38	+ 0.48	- 0.04	+ 1.74	

Time	Ther 1882	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1898.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
24 20 48	67.5	68.1	29.834	6. Observation at VII with fixed thread.	1	179 55	8.77
26 19 42	77.6	77.5	29.617	7. to. Observation at V with fixed thread.	2		5.16
4 47	65.6	67.7	29.690		3		6.91
5 11	65.7				4		6.86
5 56	65.1				5		6.79
6 6	65.2				6	10.08	
6 42	63.9				7	9.81	
6 53	...	65.7	29.726		8	4.94	
11 18 42	65.1	70.3	29.826		9	4.49	
19 44	64.8				10	9.58	
25 13	63.9				11	5.52	
26 55	63.3	65.0	29.846		12	7.34	
28 11 13	70.8	74.0	29.914		13	7.47	
19 27	68.1			Notes.	14	7.18	
19 45	67.9			6 W. to E. One microscope reading decreased 10 ".	15	7.50	
19 50	67.7			19 W. Micrometer reading increased 1 rev.	16	7.40	
20 6	66.9				17	5.56	
20 19	66.8				18	8.83	
20 55	66.1	7.8	29.944		19	5.38	
4 16	66.6	6.9	29.942				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Tauri	W	...	5 20	...	49.75	49.90	29.557	169 28 11.22	- 0.03	- 0.18	- 10.51	+28 31 19.40
		E	...	...	...	50.80	51.05	31.857	190 14 9.72	+ 1.01	+ 0.18	+ 10.50	
2	ϵ Orionis	W	...	5 31	...	50.25	50.25	31.827	139 40 9.85	+ 0.37	+ 0.01	- 48.31	- 1 15 48.20
		E	...	...	...	50.70	51.05	29.620	220 2 12.82	+ 0.97	- 0.01	+ 48.31	
3	α Orionis	W	...	5 50	...	50.25	50.30	30.310	148 20 13.58	+ 0.40	- 0.04	- 35.10	+ 7 23 26.13
		E	...	...	...	50.80	51.05	28.124	211 24 13.70	+ 1.01	+ 0.04	+ 35.10	
4	δ Ursæ Minoris S. P.	E	...	6 2 32.0	3 2.7	50.15	50.45	...	125 28 49.32	+ 0.87	- 1.07	- 19.93	+86 37 3.14
		W	...	6 8 30.0	3 4.3	49.65	50.15	...	234 21 27.75	+ 0.49	+ 1.00	+ 19.93	
5	γ Geminorum	W	...	6 32	...	50.10	49.85	29.764	157 26 11.45	+ 0.11	- 0.10	- 23.65	+16 29 13.67
		E	...	...	...	50.45	50.90	28.721	202 18 12.15	+ 0.79	+ 0.10	+ 23.65	
6	α Canis Majoris	W	...	6 39 43.0	1 45.0	50.35	50.30	...	124 26 46.95	+ 1.18	+ 5.44	- 1 23.10	-16 34 21.76
	September 29, H.	E	...	6 43 34.0	2 6.0	51.40	51.30	...	235 23 30.22	+ 2.14	- 7.84	+ 1 23.12	
7	α Ophiuchi	W	...	17 30	...	47.50	48.00	28.272	153 36 14.15	- 0.47	- 0.07	- 27.10	+12 38 9.78
		E	...	...	...	51.00	51.40	30.109	206 8 15.62	+ 2.79	+ 0.07	+ 27.10	
8	β Cygni	W	...	19 27	...	48.85	48.95	29.278	168 42 12.38	+ 0.61	- 0.18	- 11.03	+27 45 4.58
		E	...	...	...	51.75	51.60	29.261	191 2 12.52	+ 3.23	+ 0.18	+ 11.04	
9	ϵ Draconis	W	...	19 49	...	48.75	48.85	30.882	210 56 13.28	+ 0.53	- 0.91	+ 33.75	+70 0 56.53
		E	...	...	...	52.50	51.90	27.580	148 48 11.18	+ 3.72	+ 0.91	- 33.74	
10	θ Aquilæ	W	...	20 6	...	49.25	49.25	29.751	139 50 12.15	+ 0.95	+ 0.01	- 47.00	- 1 7 10.72
		E	...	...	...	51.75	51.80	28.729	219 54 12.58	+ 3.33	- 0.01	+ 47.00	
11	ϵ Delphini	W	...	20 28	...	49.45	49.45	27.823	151 56 8.58	+ 1.13	- 0.06	- 29.76	+10 57 45.56
		E	...	...	...	52.20	51.60	30.781	207 48 8.35	+ 3.43	+ 0.06	+ 29.76	
12	α Cygni	W	...	20 38	...	49.10	49.25	29.372	185 52 12.60	+ 0.87	- 0.34	+ 5.90	+44 55 25.80
		E	...	...	...	52.75	52.25	29.080	173 52 14.55	+ 4.01	+ 0.34	- 5.90	
13	β Orionis	W	...	5 10	...	48.65	49.05	30.606	132 38 10.40	- 0.66	+ 0.04	- 1 1.77	- 8 18 52.91
		E	...	...	...	50.75	51.15	27.932	227 6 13.02	+ 1.32	- 0.04	+ 1 1.77	
14	β Tauri	W	...	5 20	...	48.95	49.15	29.575	169 28 13.18	- 0.47	- 0.18	- 10.50	+28 31 19.98
		E	...	...	...	50.80	51.15	31.800	190 14 12.82	+ 1.35	+ 0.18	+ 10.50	
15	ϵ Orionis	W	...	5 31	...	49.45	49.65	31.840	139 40 10.35	0.00	+ 0.01	- 48.28	- 1 15 48.11
		E	...	...	...	50.75	51.05	29.649	220 2 11.88	+ 1.27	- 0.01	+ 48.28	
16	α Orionis	W	...	5 50	...	49.00	49.60	30.396	148 20 10.58	- 0.23	- 0.04	- 35.10	+ 7 23 26.11
		E	...	...	...	50.75	51.00	28.141	211 24 12.32	+ 1.25	+ 0.04	+ 35.10	
17	δ Ursæ Minoris S. P.	W	...	6 3 5.0	2 30.8	49.65	49.90	...	234 21 28.10	+ 1.23	+ 0.73	+ 19.80	+86 37 3.02
		E	...	6 8 8.0	2 32.2	51.00	50.95	...	125 28 49.10	+ 2.36	- 0.74	- 19.80	
18	γ Geminorum	W	...	6 32	...	49.75	50.25	29.726	157 26 13.32	+ 0.43	- 0.10	- 23.63	+16 29 14.55
		E	...	...	...	50.65	51.10	28.678	202 18 12.38	+ 1.25	+ 0.10	+ 23.63	
19	α Canis Majoris	W	...	6 39 46.0	1 43.5	50.25	50.25	...	124 26 46.70	+ 1.39	+ 5.20	- 1 23.16	-16 34 21.91
		E	...	6 43 36.0	2 6.5	51.20	51.25	...	235 23 30.11	+ 2.31	- 7.90	+ 1 23.16	

Time	Ther- (88°)	Att ther	Barom.	Observation made at IX with movable thread, except as noted below.	No	Zenith point	Red. to 1898.0
4				Observation assumed as at VII with fixed thread	1	129 55 4.00	
6.19				Observation at V with fixed thread	2	5.24	
17				Observation assumed as at III with fixed thread	3	0.74	
					4	0.22	
					5	5.80	
					6	9.06	
					7	7.16	
					8	8.73	
					9	7.14	
					10	7.04	
					11	6.42	
					12	8.28	
					13	6.66	
					14	5.20	
					15	6.11	
					16	6.38	
					17	16.09	
					18	5.09	
					19	8.95	

Notes.

- 9 W One microscope reading decreased 10".
11 W Micrometer reading increased 1 rev.
16 W One microscope reading increased 15".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Draconis	W	...	19 49	...	50.30	49.65	30.935	210 56 11.60	- 0.07	- 0.15	+ 33.94	+70 0 57.42
		E	...	...	...	55.20	53.60	27.511	148 48 13.60	+ 4.09	+ 0.15	- 33.94	
2	" Aquilæ	W	...	20 6	...	50.85	50.30	29.781	139 50 12.50	+ 0.05	+ 0.01	- 47.28	- 1 7 9.82
		E	...	...	...	55.05	53.55	28.094	219 54 12.10	+ 3.55	- 0.01	+ 47.28	
3	γ Cygni	W	...	20 19	...	50.80	50.05	30.652	180 52 13.98	- 0.09	- 0.28	+ 1.00	+39 56 17.36
		E	...	...	...	55.90	53.95	27.581	178 52 15.48	+ 4.14	+ 0.28	- 1.00	
4	ϵ Delphini	W	...	20 28	...	50.75	50.10	27.743	151 56 13.15	- 0.09	- 0.06	- 29.90	+10 57 45.84
		E	...	...	...	55.10	53.00	30.680	207 48 11.48	+ 3.61	+ 0.06	+ 29.90	
5	α Cygni	W	...	20 38	...	50.65	50.00	29.372	185 52 13.82	- 0.10	- 0.34	+ 5.94	+44 55 27.46
		E	...	...	...	55.70	53.05	28.968	173 52 16.08	+ 3.91	+ 0.34	- 5.93	
October 11, H.													
6	α Ursæ Minoris s. P.	E	...	13 18	0.0	5 37.4	54.95	54.35	127 37 47.11	+ 2.90	- 1.34	- 10.68	+88 46 11.13
		W	...	13 27	9.0	3 31.0	51.85	51.00	232 12 31.06	- 0.14	+ 0.53	- 10.68	
7	β Cygni	W	...	19 27	...	49.90	49.00	29.233	168 42 13.72	- 0.54	- 0.18	- 10.81	+27 45 4.05
		E	...	...	...	50.30	55.10	29.177	191 2 13.62	+ 5.35	+ 0.18	+ 10.81	
8	β Sagittæ	W	...	19 37	...	50.10	49.30	28.962	158 12 13.15	- 0.30	+ 0.10	- 21.77	+17 14 42.34
		E	...	...	...	50.30	54.95	29.443	201 32 13.08	+ 5.28	+ 0.10	+ 21.77	
9	ϵ Draconis	W	...	19 49	...	49.80	49.25	31.010	210 56 12.48	- 0.47	- 0.91	+ 33.06	+70 0 59.05
		E	...	...	...	50.80	55.50	27.407	148 48 13.12	+ 5.77	+ 0.91	- 33.06	
10	" Aquilæ	W	...	20 6	...	50.75	49.10	29.808	139 50 10.98	- 0.10	+ 0.01	- 46.09	- 1 7 10.47
		E	...	...	...	50.35	55.30	28.723	219 54 12.05	+ 5.47	+ 0.01	+ 46.09	
11	γ Cygni	W	...	20 19	...	50.50	49.85	30.654	180 52 14.50	+ 0.15	- 0.28	+ 0.98	+39 56 16.50
		E	...	...	...	57.40	55.30	27.581	178 52 16.15	+ 5.95	+ 0.28	- 0.98	
12	ϵ Delphini	W	...	20 28	...	50.50	49.95	27.737	151 56 14.60	+ 0.10	- 0.06	- 29.20	+10 57 46.19
		E	...	...	...	50.10	55.15	30.051	207 48 13.18	+ 5.28	+ 0.06	+ 29.20	
13	α Cygni	W	...	20 38	...	50.60	49.60	29.374	185 52 15.52	+ 0.07	- 0.34	+ 5.79	+44 55 27.85
		E	...	...	...	50.50	55.10	28.998	173 52 14.30	+ 5.45	+ 0.34	- 5.79	
October 12, H.													
14	α Ursæ Minoris s. P.	W	...	13 19	45.0	3 52.8	51.30	50.25	232 12 29.58	+ 0.14	+ 0.64	+ 11.34	+88 46 11.36
		E	...	13 25	45.0	2 7.2	54.45	55.00	127 37 46.61	+ 2.92	- 0.19	- 11.34	
15	β Cygni	W	...	19 27	...	48.75	48.40	29.250	168 42 14.12	- 0.59	- 0.18	- 11.08	+27 45 3.99
		E	...	...	...	55.45	54.70	29.192	191 2 13.52	+ 5.45	+ 0.18	+ 11.08	
16	β Sagittæ	W	...	19 37	...	49.55	49.20	29.019	158 12 11.82	+ 0.17	- 0.10	- 22.30	+17 14 42.31
		E	...	...	...	55.45	54.70	29.450	201 32 13.00	+ 5.54	+ 0.10	+ 22.30	
17	α Aquilæ	W	...	19 49	...	49.55	49.00	28.663	149 34 13.78	+ 0.07	- 0.05	- 32.80	+ 8 36 16.53
		E	...	...	...	55.80	54.90	26.068	210 12 12.08	+ 5.79	+ 0.05	+ 32.81	
18	γ Cygni	W	...	20 19	...	49.15	48.60	30.680	180 52 13.82	- 0.31	- 0.28	+ 1.00	+39 56 16.69
		E	...	...	...	50.10	54.80	27.613	178 52 14.52	+ 5.80	+ 0.28	- 1.00	
19	ϵ Delphini	W	...	20 28	...	49.40	49.10	27.770	151 56 14.50	+ 0.05	- 0.06	- 29.89	+10 57 46.93
		E	...	...	...	55.65	54.70	30.049	207 48 11.18	+ 5.63	+ 0.06	+ 29.89	

Time	Ther- mos.	Att- ther.	Barom.	Observation made at IX with movable thread, except as noted below				No.	Zenith point	Red. to 1898 o.
19 12	66.2		29.860	1	Observation at VII			1	179 53 7.06	
19 15	66.1		29.860	6	Observation assumed as at VI with fixed thread			2	7.14	
19 19	66.2		29.860	14	Observation assumed as at IV with fixed thread			3	4.86	
19 22	66.2		29.860					4	6.06	
19 25	66.2	66.7	29.860					5	7.10	
19 28	66.2	66.7	29.860					6	10.06	
19 31	66.2	66.7	29.860					7	7.80	
19 34	66.2	66.7	29.860					8	7.22	19.54
19 37	66.2	66.7	29.860					9	7.79	
19 40	66.2	66.7	29.860					10	8.08	
19 43	66.2	66.7	29.860					11	6.11	
19 46	66.2	66.7	29.860					12	8.88	
19 49	66.2	66.7	29.860					13	8.60	
19 52	66.2	66.7	29.860					14	9.55	
19 55	66.2	66.7	29.860					15	8.64	
19 58	66.2	66.7	29.860					16	8.48	19.52
20 01	66.2	66.7	29.860					17	10.84	
20 04	66.2	66.7	29.860					18	6.40	
20 07	66.2	66.7	29.860					19	7.98	

Notes
 9 W. 17 E. One microscope reading decreased 10"
 14 Unsteady
 Thermometer reading decreased 0.1°

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W	...	20 38	...	49. 70	49. 35	29. 426	185 52 13. 70	+ 0. 31	- 0. 34	+ 5. 93	+44 55 27. 47
		E	...			56. 15	55. 30	29. 017	173 52 14. 40	+ 6. 15	+ 0. 34	- 5. 93	
2	α Ursæ Minoris	W	...	1 15 32. 0	8 6. 0	51. 15	52. 65	...	229 45 0. 79	- 0. 15	- 2. 76	+ 1 7. 97	+88 46 10. 47
	October 13, H.	E	...	1 32 50. 0	9 12. 0	58. 10	59. 00	...	130 5 16. 76	+ 6. 12	+ 3. 57	- 1 7. 97	
3	β Cygni	W	...	19 27	...	53. 00	52. 40	29. 270	168 42 12. 70	- 0. 43	- 0. 18	- 11. 13	+27 45 5. 15
		E	...			57. 35	57. 45	29. 183	191 2 12. 48	+ 4. 01	+ 0. 18	+ 11. 13	
4	β Sagittæ	W	...	19 37	...	52. 65	52. 40	29. 088	158 12 9. 90	- 0. 59	- 0. 10	- 22. 41	+17 14 42. 69
		E	...			57. 35	57. 30	29. 468	201 32 13. 02	+ 3. 94	+ 0. 10	+ 22. 41	
5	α Aquilæ	W	...	19 46	...	53. 00	52. 60	28. 603	149 34 13. 15	- 0. 33	- 0. 05	- 32. 97	+ 8 36 15. 53
		E	...			57. 65	56. 75	27. 027	210 12 9. 85	+ 3. 81	+ 0. 05	+ 32. 97	
6	θ Aquilæ	W	...	20 6	...	52. 95	52. 70	29. 855	139 50 9. 62	- 0. 30	+ 0. 01	- 47. 37	- 1 7 9. 35
		E	...			57. 55	56. 65	28. 684	219 54 10. 95	+ 3. 73	- 0. 01	+ 47. 37	
7	γ Cygni	W	...	20 19	...	52. 90	52. 55	30. 660	180 52 14. 20	- 0. 40	- 0. 28	+ 1. 00	+39 56 16. 34
		E	...			58. 05	57. 35	27. 682	178 52 13. 45	+ 4. 29	+ 0. 28	- 1. 00	
8	ϵ Delphini	W	...	20 28	...	52. 95	52. 80	27. 809	151 56 11. 68	- 0. 25	- 0. 06	- 29. 96	+10 57 45. 88
		E	...			57. 45	56. 65	30. 690	207 48 11. 88	+ 3. 68	+ 0. 06	+ 29. 96	
9	α Cygni	W	...	20 38	...	53. 00	52. 55	29. 422	185 52 14. 12	- 0. 35	- 0. 34	+ 5. 94	+44 55 27. 99
		E	...			58. 00	57. 15	29. 009	173 52 15. 28	+ 4. 17	+ 0. 34	- 5. 94	
10	α Ursæ Minoris	E	...	1 17 25. 0	6 13. 4	57. 15	56. 30	...	130 5 20. 10	+ 4. 39	+ 1. 63	- 1 7. 42	+88 46 10. 33
	October 14, H.	W	...	1 31 2. 0	7 23. 6	53. 75	53. 25	...	229 44 59. 32	+ 1. 35	- 2. 30	+ 1 7. 42	
11	α Ursæ Minoris	W	...	1 15 35. 0	8 4. 2	51. 45	51. 55	...	229 45 2. 12	- 0. 29	- 2. 74	+ 1 8. 52	+88 46 10. 93
	October 15, H.	E	...	1 32 52. 0	9 12. 8	59. 35	57. 95	...	130 5 17. 82	+ 6. 44	+ 3. 57	- 1 8. 50	
12	α Ursæ Minoris S. P.	W	...	13 16 8. 0	7 31. 6	50. 55	50. 70	...	232 12 27. 78	+ 0. 70	+ 2. 39	+ 1 13. 60	+88 46 12. 86
	October 16, H.	E	...	13 29 51. 0	6 11. 4	57. 50	56. 45	...	127 37 52. 31	+ 6. 67	- 1. 62	- 1 13. 60	
13	ϵ Delphini	W	...	20 28	...	50. 95	51. 05	27. 876	151 56 13. 25	+ 0. 03	- 0. 06	- 30. 58	+10 57 46. 74
		E	...			61. 15	59. 90	30. 540	207 48 14. 28	+ 9. 00	+ 0. 06	+ 30. 58	
14	α Cygni	W	...	20 38	...	50. 50	50. 60	29. 557	185 52 13. 62	- 0. 39	- 0. 34	+ 6. 06	+44 55 29. 20
		E	...			61. 50	60. 10	28. 978	173 52 14. 22	+ 9. 25	+ 0. 34	- 6. 06	
15	β Tauri	W	...	5 20	...	50. 10	50. 45	29. 711	169 28 12. 00	- 0. 20	- 0. 18	- 10. 80	+28 31 20. 65
		E	...			61. 00	59. 90	31. 713	190 14 10. 98	+ 9. 38	+ 0. 18	+ 10. 80	
16	ϵ Orionis	W	...	5 31	...	50. 80	50. 85	31. 934	139 40 10. 20	+ 0. 31	+ 0. 01	- 49. 65	- 1 15 49. 12
		E	...			60. 75	59. 60	29. 542	220 2 11. 58	+ 9. 12	- 0. 01	+ 49. 65	
17	ν Geminorum	W	...	6 23	...	50. 90	50. 60	28. 913	161 14 11. 55	+ 0. 24	- 0. 12	- 19. 83	+20 16 37. 86
		E	...			60. 70	59. 45	29. 649	198 30 10. 65	+ 9. 03	+ 0. 12	+ 19. 83	
18	α Canis Majoris	W	...	6 38 26. 0	2 54. 3	51. 30	51. 10	...	124 26 42. 74	+ 1. 40	+15. 00	- 1 25. 39	-16 34 23. 66
		E	...	6 44 15. 0	2 54. 7	61. 85	60. 30	...	235 23 33. 58	+10. 70	-15. 07	+ 1 25. 41	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.					No.	Zenith point.	Red. to 1898.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	
12 20 47	59. 8	60. 5	29. 714	2, 11. Observation assumed as at VII with fixed thread.					1	179 55 9. 68	
1 12		54. 5	29. 780	10, 12. Observation assumed as at III with fixed thread.					2	12. 16	
1 24	51. 4			18. Observation at V with fixed thread.					3	6. 98	
13 19 18	60. 0	63. 0	29. 768						4	7. 52	-19. 51
19 17	60. 0								5	8. 18	
19 46	60. 5								6	6. 34	
20 6	60. 4								7	6. 09	
20 19	60. 1								8	7. 03	
20 28	59. 9								9	8. 76	
20 52	59. 9	60. 0	29. 770						10	12. 24	
1 23	55. 1	56. 6	29. 744						11	13. 47	
14 1 24	46. 1	48. 5	29. 663						12	14. 12	
15 14 23	59. 7	56. 0	30. 006	Notes.					13	10. 12	
16 20 16	53. 9	56. 0	30. 011	12. Unsteady.					14	12. 61	
20 48	53. 9	56. 0	30. 011	13E. One microscope reading increased 10".					15	9. 33	
4 45		46. 5	30. 010	17. Poor.					16	9. 92	
5 20	44. 1								17	10. 55	
5 31	44. 1								18	14. 18	
6 23	44. 7										
6 41	44. 0	45. 5	30. 025								

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P. October 18, H.	E W	...	13 14 26.0 13 31 44.0	9 14.4 8 3.6	58.05 51.55	57.50 52.00	...	127 37 55.24 232 12 26.16	+ 5.62 - 0.03	+ 3.60 + 2.73	+ 14.10 + 14.11	+88 46 13.32
2	α Ursæ Minoris S. P. October 19, H.	W E	...	13 16 23.0 13 30 2.0	7 18.4 6 20.6	50.30 58.40	49.15 56.35	...	232 12 27.88 127 37 52.39	+ 0.51 + 7.71	+ 2.25 - 1.70	+ 12.68 - 12.68	+88 40 14.42
3	ϵ Delphini	W E	...	20 28 ... ...	...	50.75 59.95	49.35 57.35	27.866 30.669	151 56 12.98 207 48 10.48	- 0.25 + 7.85	- 0.00 + 0.06	- 30.31 + 30.31	+10 57 46.38
4	α Cygni	W E	...	20 38 ... ...	...	50.65 60.45	49.35 57.55	20.542 29.019	185 52 12.25 173 52 12.72	- 0.20 + 8.17	- 0.34 + 0.34	+ 6.01 - 6.01	+44 55 28.66
5	δ Canum Venat.	W E	...	12 51 ... ...	...	51.50 57.15	50.50 55.35	27.193 28.368	179 50 11.48 179 56 11.52	+ 0.31 + 5.25	- 0.27 + 0.27	- 0.06 + 0.06	+38 51 49.96
6	α Ursæ Minoris S. P. October 20, H.	E W	...	13 14 40.0 13 31 51.0	9 1.9 8 9.1	56.40 50.65	54.60 49.20	...	127 37 55.79 232 12 27.72	+ 4.00 - 0.27	+ 3.44 + 2.80	- 12.64 + 12.66	+88 46 14.13
7	ϵ Delphini	W E	...	20 28 ... ...	...	50.45 58.15	49.35 56.60	27.898 30.680	151 56 11.12 207 48 10.05	- 0.47 + 6.57	- 0.06 + 0.06	- 30.10 + 30.10	+10 57 46.81
8	α Cygni	W E	...	20 38 ... ...	...	50.60 58.80	49.15 56.45	20.520 29.021	185 52 12.20 173 52 13.82	- 0.49 + 6.81	- 0.34 + 0.34	+ 5.97 - 5.97	+44 55 28.32
9	α Ursæ Minoris October 23, H.	E W	...	1 17 37.0 1 31 1.0	6 5.3 7 18.7	58.05 51.00	55.90 49.60	...	130 5 17.89 229 45 3.84	+ 7.21 + 0.93	+ 1.57 - 2.25	- 8.17 + 8.19	+88 46 12.87
10	α Ursæ Minoris	W E	...	1 15 34.0 1 32 59.0	8 7.9 9 17.1	51.55 61.60	54.30 62.85	...	229 45 5.04 130 5 16.52	- 0.20 + 8.47	- 2.78 + 3.64	+ 10.14 - 10.11	+88 46 14.35
11	α Ursæ Minoris S. P. October 24, H.	W E	...	13 16 47.0 13 30 24.0	6 54.8 6 42.2	51.80 59.55	55.30 62.15	...	232 12 25.30 127 37 56.84	+ 0.29 + 7.17	+ 2.01 - 1.90	+ 13.67 - 13.69	+88 46 16.77
12	ϵ Delphini	W E	...	20 28 ... ...	...	47.90 58.85	51.55 61.10	27.984 30.692	151 56 12.95 207 48 11.98	- 0.29 + 9.35	- 0.06 + 0.06	+ 30.58 + 30.58	+10 57 46.48
13	α Cygni	W E	...	20 38 ... ...	...	48.55 59.05	51.80 61.05	20.616 29.050	185 52 14.10 173 52 15.88	+ 0.13 + 9.90	- 0.34 + 0.34	+ 6.13 - 6.13	+44 55 28.20
14	α Ursæ Minoris October 27, H.	E W	...	1 17 43.0 1 31 0.0	5 58.9 7 18.1	58.50 50.30	60.85 53.15	...	130 5 15.60 229 45 3.04	+ 10.00 + 2.60	+ 1.51 - 2.25	- 9.15 + 9.15	+88 46 14.00
15	α Cygni	W E	...	20 38 ... ...	...	50.60 61.40	54.05 63.60	20.491 28.989	185 52 8.40 173 52 8.50	- 0.23 + 9.36	- 0.34 + 0.34	+ 6.22 - 6.22	+44 55 28.06
16	α Cygni	W E	...	20 53 ... ...	...	51.35 61.50	54.30 63.35	31.728 29.631	181 42 10.45 178 0 8.35	+ 0.24 + 9.20	- 0.29 + 0.29	+ 1.92 - 1.92	+40 46 57.73
17	α Cygni	W E	...	21 9 ... ...	...	51.25 61.45	54.35 63.55	29.251 29.251	170 46 8.05 188 58 10.95	+ 0.22 + 9.36	- 0.19 + 0.19	- 9.48 + 9.48	+20 49 1.07

Time	Ther- m.	Att. ther	Barom	Observation made at IX with movable thread, except as noted below				No	Zenith point	Red. to 1898.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	
19 11 21	59.6	56.5	30.204	1.6.15	Observation assumed as at VII with fixed thread.				1	179 55 14.60
19 11 27	62.9	59.8	29.892	2.9.11.14	Observation assumed as at III with fixed thread.				2	14.57
19 11 15	60.0	56.0	29.872						3	9.80
19 11 45	60.0	56.5	29.874						4	11.27
19 11 47	60.5	64.0	30.025						5	7.81
19 11 21	60.2								6	13.80
19 11 27		64.1	30.024						7	8.78
19 11 22	61.1	61.1	29.967						8	10.75
19 11 20	59.8	61.0	29.970						9	14.60
19 11 21	52.9								10	16.10
19 11 49		64.0	29.940						11	14.89
19 11 27		45.5	30.098						12	14.14
19 11 24	41.9								13	16.99
19 11 27		59.0	30.182						14	18.49
19 11 24	62.0								15	6.16
19 11 22	60.0	66.0	30.114						16	6.10
19 11 44	59.0	62.0	30.112						17	7.89
19 11 24	49.0	60.1	30.118							
19 11 22	41.9	44.5	30.002							
19 11 21	41.7									
19 11 27	41.1									

Notes.
5. Pam.
11 Unsteady

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cephei	W E		21 16		51.35 61.55	54.15 63.75	29.480 28.982	203 6 9.90 156 38 9.55	+ 0.17 + 9.50	- 0.63 + 0.63	+ 25.42 - 25.42	+62 9 47.24
2	μ Capricorni	W E		21 46 3.0 21 51 36.0	2 27.1 3 5.9	51.15 61.35	54.55 63.50		126 59 24.22 232 50 48.68	+ 1.00 +10.02	+11.16 -17.82	-1 18.43 +1 18.45	-14 1 33.93
3	α Aquarii	W E		21 59 22.0 22 3 48.0	1 56.5 2 29.5	52.00 61.05	55.30 63.35		140 11 59.85 219 38 8.32	+ 1.75 + 9.81	+ 9.01 -14.84	- 49.33 + 49.34	- 0 48 28.9
4	γ Aquarii	W E		22 15 16.0 22 19 41.0	1 53.1 2 31.9	52.75 61.40	55.50 63.55		139 6 54.58 220 43 17.40	+ 2.29 +10.06	+ 8.30 -14.97	- 51.29 + 51.30	- 1 53 38.24
5	226 B. Cephei	W E		22 30		51.95 61.10	54.90 63.30	30.393 28.210	216 38 6.92 143 6 8.58	+ 0.81 + 9.07	- 1.32 + 1.32	+ 44.47 - 44.47	+75 42 39.53
6	α Ursæ Minoris	W E		1 15 43.0 1 33 20.0	8 1.2 9 35.8	52.35 60.70	55.30 62.95		229 45 3.31 130 5 11.91	+ 1.63 + 9.16	- 2.70 + 3.88	+1 10.87 -1 10.87	+88 46 16.28
7	α Ursæ Minoris S. P. October 28, H.	E W		13 18 49.0 13 28 14.0	4 55.4 4 29.6	62.25 56.80	53.45 48.40		127 37 55.30 232 12 17.74	+ 6.20 + 1.26	- 1.03 + 0.86	-1 15.48 +1 15.49	+88 46 18.07
8	μ Aquarii	W E		20 45 42.0 20 50 49.0	2 13.4 2 53.6	55.55 64.30	47.30 54.80		131 39 6.19 228 11 6.26	+ 0.29 + 7.94	+ 9.98 -16.90	-1 6.10 +1 6.10	- 9 21 39.77
9	ζ Cygni	W E		21 9		49.65 58.15	49.30 56.90	29.235 29.338	170 46 8.38 188 58 8.12	+ 0.17 + 7.75	- 0.19 + 0.19	- 9.47 + 9.47	+29 49 1.33
10	ξ Aquarii	W E		21 30 55.0 21 35 57.0	2 10.8 2 51.2	49.00 58.75	49.00 57.00		132 42 24.80 227 7 46.18	+ 0.46 + 8.81	+ 9.79 -16.76	-1 3.90 +1 3.90	- 8 18 18.74
11	158 B. Cephei	W E		21 52		49.55 58.55	48.90 56.95	29.222 29.386	214 10 7.98 145 34 8.02	- 0.07 + 7.96	- 1.11 + 1.11	+ 40.39 - 40.39	+73 13 48.65
12	α Aquarii	W E		22 1		50.00 57.60	49.75 56.25	30.865 27.712	140 8 9.82 219 36 7.40	+ 0.55 + 7.19	+ 0.01 - 0.01	- 49.19 + 49.19	- 0 48 30.17
13	θ Aquarii	W E		22 12		50.45 57.70	49.75 56.05	30.475 28.165	132 40 6.08 227 4 8.38	+ 0.76 + 7.14	+ 0.04 - 0.04	-1 3.89 +1 3.89	- 8 17 4.27
14	η Aquarii	W E		22 30		50.65 57.70	49.95 56.15	28.431 27.078	140 20 10.45 219 26 12.05	+ 0.95 + 7.19	+ 0.01 - 0.01	- 48.97 + 48.97	- 0 38 8.51
15	ϵ Cephei	W E		22 46		49.35 57.75	48.45 56.25	30.420 28.080	206 36 11.15 153 8 11.25	- 0.38 + 7.25	- 0.75 + 0.75	+ 29.86 - 29.86	+65 40 29.77
16	α Pegasi	W E		23 0		50.25 57.45	49.60 56.00	28.035 27.659	155 38 9.48 204 8 7.15	+ 0.59 + 7.00	- 0.08 + 0.08	- 26.69 + 26.69	+14 39 55.61
17	τ Pegasi	W E		23 16		49.25 57.30	48.55 56.35	30.028 28.540	164 8 9.28 195 36 7.48	- 0.37 + 7.09	- 0.14 + 0.14	- 16.69 + 16.68	+23 11 27.47
18	α Ursæ Minoris October 30, H.	E W		1 21 45.0 1 31 7.0	1 59.9 7 22.1	57.00 50.05	56.00 49.95		130 5 14.39 229 45 1.39	+ 7.66 + 1.69	+ 0.17 - 2.30	-1 10.19 +1 10.19	+88 46 16.28
19	α Ursæ Minoriss. P.	W E		13 17 10.0 13 30 35.0	6 36.2 6 48.8	50.25 56.20	50.05 56.20		232 12 20.18 127 37 55.74	+ 0.29 + 6.00	+ 1.84 - 1.95	+1 14.10 -1 14.10	+88 46 17.89

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.		No.	Zenith point.	Red. to 1898.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>				<i>° ' "</i>	<i>"</i>
27 21 16	41.1		30.055	2, 3, 4, 8, 10.	Observation at V with fixed thread.	1	179 55 7.34	
21 49	40.2		30.074	6.	Observation assumed as at VII with fixed thread.	2	8.64	
22 2	39.9			7.	Observation assumed as at VI with fixed thread.	3	6.96	
22 17	39.7			18.	E. observation assumed as at IV, and W. as at III, with fixed thread.	4	8.79	
1 14	39.1			19.	Observation assumed as at III with fixed thread.	5	8.35	
1 25	36.6					6	13.60	
13 13		46.5	30.145			7	10.17	
13 23	49.5					8	6.88	
28 20 10		46.5	30.090			9	7.27	
20 48	43.8					10	6.64	
21 9	43.2					11	7.72	
21 33	42.3					12	7.60	
21 52	42.1					13	7.60	
28 1	41.9					14	7.82	
22 20	41.9	43.5	30.088			15	6.20	
22 30	41.1					16	8.36	
22 46	41.8					17	6.68	
23 0	41.9					18	11.50	
23 16	41.9					19	11.05	
1 15		41.3	30.082					
1 21	41.3							
30 13 24	51.3	50.2	29.830					

No.	Date, observer, and object.	Circ- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
October 31, H.				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	α Cygni	W E		20 38		48.55 50.00	49.90 58.85	29.603 29.662	185 52 8.58 173 52 9.02	+ 0.10 + 8.93	- 0.34 + 0.34	+ 6.11 - 6.11	+44 55 28.77
2	220 H ¹ . Draconis	W E		20 52		48.90 50.30	49.70 58.60	30.476 31.200	221 6 5.12 138 36 5.88	+ 0.13 + 8.95	- 1.04 + 1.94	+ 50.98 - 50.98	+80 10 46.08
3	ζ Cygni	W E		21 9		49.00 58.05	51.00 59.90	29.250 29.332	170 46 8.98 188 58 0.40	+ 0.54 + 9.01	- 0.19 + 0.10	+ 9.33 - 9.33	+29 40 1.10
4	ζ Capricorni	W E		21 18 48.0 21 25 16.0	2 50.9 3 37.1	49.80 50.30	51.50 59.85		118 10 30.65 241 39 44.35	+ 1.88 +10.28	+12.06 -20.91	-1 48.11 +1 48.13	-22 50 55.49
5	16 Pegasi	W E		21 49		48.55 58.45	50.95 59.35	29.631 28.887	166 24 10.60 193 20 9.12	+ 0.31 + 8.93	- 0.16 + 0.16	+ 13.97 - 13.97	+25 27 14.24
6	α Aquarii	W E		22 1		48.55 58.55	50.95 59.95	30.933 27.692	140 8 8.50 219 36 8.58	+ 0.31 + 9.26	+ 0.01 - 0.01	+ 48.46 - 48.46	- 0 48 30.04
7	θ Aquarii	W E		22 12		48.75 58.30	51.00 59.25	30.527 28.238	132 40 3.62 227 4 6.90	+ 0.43 + 8.81	+ 0.04 - 0.04	+ 2.95 - 2.95	- 8 17 3.26
8	γ Aquarii	W E		22 30		48.80 58.05	51.10 59.50	28.481 27.180	140 20 7.75 219 26 9.00	+ 0.50 + 8.81	+ 0.01 - 0.01	+ 48.25 - 48.25	- 0 38 3.72
9	λ Pegasi	W E		22 42		48.50 58.15	52.40 60.85	28.350 30.302	164 0 9.85 195 44 7.52	+ 0.99 + 9.51	- 0.14 + 0.14	+ 16.65 - 16.65	+23 2 17.00
10	α Pegasi	W E		23 0		48.65 58.15	52.45 60.90	28.023 27.629	155 38 8.18 204 8 8.22	+ 1.08 + 9.53	- 0.08 + 0.08	+ 26.37 - 26.37	+14 39 54.08
11	σ Cephei	W E		23 15		48.50 58.95	52.10 61.35	29.520 29.995	208 30 6.70 151 14 9.12	+ 0.84 +10.12	- 0.82 + 0.82	+ 32.00 - 32.00	+67 33 50.75
12	λ Andromedæ	W E		23 33		48.85 58.90	52.50 61.20	31.681 26.893	186 50 9.12 172 54 8.92	+ 1.19 +10.02	- 0.35 + 0.35	+ 7.20 - 7.20	+45 54 5.34
13	Groombridge 4163	W E		23 50		49.00 58.95	52.50 61.30	31.261 30.331	214 46 7.48 144 56 8.20	+ 1.26 + 9.95	- 1.16 + 1.16	+ 41.00 - 41.00	+73 51 10.86
14	α Ursæ Minoris	W E		1 15 38.0 1 33 16.0	8 8.4 9 29.6	49.25 57.75	53.00 60.55		229 45 4.95 130 5 12.14	+ 2.05 + 9.62	- 2.79 + 3.80	+1 9.89 -1 9.89	+88 46 15.96
November 1, H.													
15	α Cygni	W E		20 38		47.95 56.05	52.20 60.60	29.583 29.069	185 52 8.40 173 52 9.65	+ 0.54 + 7.53	- 0.34 + 0.34	+ 6.14 - 6.14	+44 55 28.38
16	γ Cygni	W E		20 53		48.55 57.50	52.60 60.00	31.806 29.619	181 42 9.90 178 0 9.65	+ 0.07 + 7.63	- 0.29 + 0.29	+ 1.90 - 1.90	+40 46 59.28
17	γ Cygni	W E		21 11		48.60 56.55	52.90 60.00	29.161 29.288	178 34 10.32 181 10 10.10	+ 0.10 + 7.19	- 0.26 + 0.26	+ 1.33 - 1.33	+37 37 9.12
18	β Aquarii	W E		21 26		49.35 56.25	53.15 59.90	30.713 27.960	134 56 6.18 224 48 10.70	+ 0.57 + 7.00	+ 0.03 - 0.03	+ 58.24 - 58.24	- 0 0 50.74
19	α Aquarii	W E		22 1		49.90 56.20	54.35 59.95	28.031 27.791	140 10 6.75 219 36 6.38	+ 1.39 + 7.00	+ 0.01 - 0.01	+ 48.66 - 48.66	- 0 48 29.63
20	γ Aquarii	W E		22 16		49.70 56.10	53.70 59.65	29.282 29.406	130 4 8.12 220 40 7.42	+ 0.99 + 6.81	+ 0.01 - 0.01	+ 50.54 - 50.54	- 1 53 38.87

Time	Ther- m.	Atm- ther.	Barom	Observation made at IX with movable thread, except as noted below							No.	Zenith point	Red. to 1898.0.
2 30.00	48.6	50.0	29.969	4 Observation at V with fixed thread							1	179 55 10.09	
3 00.00	47.9			14 Observation assumed as at VII with fixed thread.							2	8.40	
3 30.00	47.8										3	9.20	
4 00.00	47.5										4	9.62	
4 30.00	47.5										5	8.40	
5 00.00	47.5										6	9.42	
5 30.00	47.5										7	8.86	
6 00.00	47.5	47.5	29.962								8	8.61	
6 30.00	47.2										9	10.60	
7 00.00	46.8										10	8.99	
7 30.00	46.1										11	9.38	
8 00.00	45.1										12	9.68	12.21
8 30.00	44.6										13	10.14	
9 00.00	44.0										14	14.88	
9 30.00	43.9										15	9.18	
10 00.00	43.7	43.7	29.966								16	6.52	
10 30.00	43.5	43.5	29.974	Note							17	6.45	
11 00.00	43.5			6 W. One microscope reading increased 10".							18	9.11	
11 30.00	43.5										19	9.62	
12 00.00	43.2										20	9.07	

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	7 Lacertæ	W	...	22 27	...	49. 10	53. 10	30. 390	190 42 10. 00	+ 0. 43	- 0. 40	+ 11. 23	+49 46 7. 97
		E	...	...	...	57. 15	60. 40	28. 269	169 2 8. 60	+ 7. 65	+ 0. 40	- 11. 23	
2	α Pegasi	W	...	23 0	...	49. 95	54. 20	27. 999	155 38 9. 35	+ 1. 35	- 0. 08	- 26. 45	+14 39 54. 12
		E	...	...	...	56. 45	60. 10	27. 721	204 8 7. 02	+ 7. 19	+ 0. 08	+ 26. 45	
3	φ Aquarii	W	...	23 9	...	40. 50	53. 90	29. 887	134 22 3. 42	+ 0. 99	+ 0. 03	- 59. 60	- 6 35 29. 78
		E	...	...	...	56. 30	59. 95	29. 068	225 22 4. 52	+ 7. 05	- 0. 03	+ 59. 60	
4	θ Piscium	W	...	23 23	...	40. 55	53. 90	30. 886	146 46 6. 35	+ 1. 02	- 0. 03	- 38. 24	+ 5 49 37. 38
		E	...	...	...	56. 25	59. 90	27. 875	212 58 5. 50	+ 7. 00	+ 0. 03	+ 38. 24	
5	γ Cephei	W	...	23 35	...	40. 35	53. 55	30. 053	218 0 6. 62	+ 0. 75	- 1. 46	+ 46. 10	+77 4 25. 70
		E	...	...	...	56. 95	59. 90	28. 697	141 44 6. 78	+ 7. 33	+ 1. 46	- 46. 10	
6	α Andromedæ	W	...	0 3	...	40. 60	53. 95	31. 019	169 28 9. 20	+ 1. 07	- 0. 18	- 10. 78	+28 32 12. 86
		E	...	...	...	55. 65	59. 85	27. 620	190 16 8. 20	+ 6. 69	+ 0. 18	+ 10. 78	
7	α Ursæ Minoris	E	...	1 17 49. 0	5 57. 4	55. 80	59. 35	...	130 5 14. 08	+ 7. 55	+ 1. 50	- 1 9. 79	+88 46 17. 62
		W	...	1 30 48. 0	7 1. 6	50. 70	54. 70	...	229 45 4. 44	+ 2. 95	- 2. 08	+ 1 9. 79	
8	α Ursæ Minoris S. P.	E	...	13 15 13. 0	7 41. 1	53. 05	57. 20	...	127 38 3. 79	+ 3. 46	- 2. 49	- 1 13. 76	+88 46 21. 16
		W	...	13 32 43. 0	9 48. 9	49. 65	53. 05	...	232 12 17. 51	- 0. 11	+ 4. 05	+ 1 13. 76	
9	α Ursæ Minoris S. P. November 3, H.	W	...	13 17 4 0	5 55. 6	40. 90	53. 55	...	232 12 16. 02	+ 0. 41	+ 1. 48	+ 1 14. 85	+88 46 21. 53
		E	...	13 30 54. 0	7 54. 4	54. 30	58. 40	...	127 38 1. 99	+ 4. 77	- 2. 64	- 1 14. 85	
10	α Cygni November 6, H.	W	...	20 38	...	51. 70	53. 70	29. 552	185 52 8. 45	- 0. 49	- 0. 34	+ 6. 00	+44 55 28. 41
		E	...	...	...	58. 55	59. 60	29. 080	173 52 9. 70	+ 5. 51	+ 0. 34	- 6. 00	
11	12 Canum Venat.	W	...	12 51	...	52. 25	54. 20	27. 088	179 50 8. 18	+ 0. 33	- 0. 27	- 0. 06	+38 51 45. 26
		E	...	...	...	57. 15	58. 45	28. 500	179 56 8. 50	+ 4. 65	+ 0. 27	+ 0. 06	
12	α Ursæ Minoris S. P.	E	...	13 19 27. 0	3 40. 7	55. 65	57. 50	...	127 38 1. 38	+ 4. 08	- 0. 57	- 1 15. 04	+88 46 21. 81
		W	...	13 28 31. 0	5 23. 3	51. 80	53. 70	...	232 12 16. 00	+ 0. 48	+ 1. 24	+ 1 15. 04	
13	α Cygni November 7, H.	W	...	20 38	...	51. 35	53. 75	29. 560	185 52 7. 82	- 0. 29	- 0. 34	+ 6. 16	+44 55 28. 58
		E	...	...	...	57. 40	58. 55	29. 117	173 52 8. 72	+ 4. 81	+ 0. 34	- 6. 15	
14	α Aquarii	W	...	22 1	...	51. 70	54. 00	28. 015	140 10 7. 10	- 0. 01	+ 0. 01	- 48. 83	- 0 48 30. 02
		E	...	...	...	56. 40	58. 25	27. 821	219 36 6. 65	+ 4. 20	- 0. 01	+ 48. 83	
15	θ Aquarii	W	...	22 12	...	51. 50	53. 55	30. 549	132 40 5. 00	- 0. 33	+ 0. 04	- 1 3. 43	- 8 17 4. 24
		E	...	...	...	56. 35	57. 85	28. 319	227 4 6. 88	+ 3. 99	- 0. 04	+ 1 3. 43	
16	γ Aquarii	W	...	22 30	...	51. 60	53. 70	28. 492	140 20 8. 38	- 0. 21	+ 0. 01	- 48. 61	- 0 38 8. 72
		E	...	...	...	56. 45	58. 05	27. 288	219 26 6. 88	+ 4. 13	- 0. 01	+ 48. 61	
17	λ Pegasi	W	...	22 42	...	51. 60	53. 50	28. 377	164 0 9. 38	- 0. 30	- 0. 14	- 16. 77	+23 2 17. 92
		E	...	...	...	56. 95	57. 90	30. 349	195 44 8. 05	+ 4. 29	+ 0. 14	+ 16. 77	
18	α Pegasi	W	...	23 0	...	52. 00	53. 55	27. 983	155 38 11. 08	- 0. 09	- 0. 08	- 26. 55	+14 39 56. 00
		E	...	...	...	56. 30	57. 60	27. 632	204 8 9. 65	+ 3. 84	+ 0. 08	+ 26. 55	
19	ο Cephei	W	...	23 15	...	51. 55	53. 15	29. 461	208 30 9. 42	- 0. 49	- 0. 82	+ 32. 19	+67 33 51. 90
		E	...	...	...	57. 05	57. 90	29. 142	151 14 9. 98	+ 4. 33	+ 0. 82	- 32. 19	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.				No.	Zenith point.	Red. to 1898.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
1 22 35	46. 9	47. 0	30. 068	7. 9	Observation assumed as at III with fixed thread.				1	179 55 10. 15
23 0	45. 9	...	...	8	Observation assumed as at VII with fixed thread.				2	9. 24
23 9	46. 0	...	...	12.	Observation at VI with fixed thread.				3	10. 83
24 15	46. 0	...	...						4	8. 82
24 35	45. 9	...	...						5	9. 38
0 18	45. 2	45. 8	30. 066						6	8. 98
1 24	43. 5	44. 5	30. 046						7	14. 22
13 24	49. 0	54. 0	30. 033						8	13. 10
1 11 24	45. 8	53. 8	30. 286						9	11. 02
6 20 24	41. 9	54. 5	29. 584						10	7. 82
12 12	45. 9	45. 8	30. 030						11	4. 94
13 24	49. 9	48. 0	30. 050						12	11. 40
7 20 18	47. 4	50. 5	30. 036						13	7. 70
22 1	45. 0	...	...						14	8. 13
22 12	44. 9	...	...						15	8. 84
22 20	44. 4	46. 7	30. 061						16	7. 61
22 42	44. 2	...	...						17	8. 89
23 0	44. 0	...	...						18	6. 88
23 15	43. 8	...	...						19	7. 28

Note.
Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Cephei	W	...	23 35	...	51.80	53.25	30.089	218 0 0.92	- 0.33	- 1.46	+ 46.32	+77 4 27.46
		E	...	...	...	56.85	58.00	28.709	141 44 0.88	+ 4.29	+ 1.40	- 46.32	
2	ω Piscium	W	...	23 54	...	51.90	53.05	29.049	147 16 7.80	- 0.38	- 0.03	- 37.79	+ 6 18 25.32
		E	...	...	...	50.45	57.50	29.642	212 28 6.50	+ 3.86	+ 0.03	+ 37.79	
3	β Cassiopeiæ	W	...	0 4	...	51.85	53.60	29.746	199 32 7.28	- 0.14	- 0.55	+ 21.13	+58 35 51.72
		E	...	...	...	56.90	57.95	28.916	100 12 7.90	+ 4.29	+ 0.55	- 21.13	
4	ε Ceti	W	...	0 14	...	52.40	54.05	30.869	131 34 4.08	+ 0.33	+ 0.05	- 1 6.27	- 9 22 53.78
		E	...	...	...	56.50	57.55	28.010	228 10 5.82	+ 3.91	- 0.05	+ 1 6.27	
5	μ Andromedæ	W	...	0 51	...	52.30	53.70	29.440	178 54 9.58	+ 0.12	- 0.26	+ 1.00	+37 57 21.34
		E	...	...	...	50.25	57.55	29.075	180 50 9.08	+ 3.79	+ 0.20	+ 1.00	
6	β Andromedæ	W	...	1 4	...	52.25	54.05	29.535	176 2 9.32	+ 0.26	- 0.23	- 3 97	+35 5 18.56
		E	...	...	...	55.95	57.25	29.103	183 42 11.05	+ 3.51	+ 0.23	+ 3 97	
7	α Ursæ Minoris	W	...	1 20 1.0	3 8.5	52.55	54.75	...	229 45 3.61	+ 1.33	- 0.43	+ 10.18	+88 46 19.40
		E	...	1 29 21.0	6 11.5	56.05	57.05	...	130 5 13.80	+ 4.05	+ 1.01	- 10.18	
8	α Ursæ Minoris S. P.	W	...	13 20 50.0	2 11.3	51.95	53.90	...	232 12 16.26	+ 0.23	+ 0.20	+ 14.56	+88 46 22.43
	November 11, H.	E	...	13 27 0.0	3 49.7	54.30	50.75	...	127 38 2.05	+ 2.69	- 0.63	- 14.56	
9	α Cygni	W	...	20 38	...	53.35	54.10	29.539	185 52 7.25	- 0.02	- 0.34	+ 6.14	+44 55 27.92
		E	...	...	...	58.45	58.55	29.140	173 52 8.22	+ 4.47	+ 0.34	- 6.14	
10	π Pegasi	W	...	22 5	...	52.85	54.35	29.443	173 38 8.78	- 0.13	- 0.22	- 6.37	+32 41 13.72
		E	...	...	...	58.00	58.55	29.160	186 6 8.75	+ 4.27	+ 0.22	+ 6.37	
11	γ Lacertæ	W	...	22 27	...	52.80	53.80	27.412	190 44 8.60	- 0.42	- 0.40	+ 11.30	+49 46 7.53
		E	...	...	...	58.80	58.75	28.215	169 2 10.82	+ 4.73	+ 0.40	- 11.30	
12	ζ Pegasi	W	...	22 36	...	52.95	54.00	28.903	151 16 8.88	- 0.25	- 0.06	- 32.15	+10 18 26.57
		E	...	...	...	57.95	58.50	29.701	208 28 7.68	+ 4.22	+ 0.06	+ 32.15	
13	λ Aquarii	W	...	22 47	...	53.00	53.90	30.801	132 50 2.38	- 0.27	+ 0.04	- 1 3.30	- 8 6 55.29
		E	...	...	...	58.00	58.40	28.135	226 54 4.25	+ 4.19	- 0.04	+ 1 3.30	
14	φ Aquarii	W	...	23 9	...	53.25	54.10	29.842	134 22 3.02	- 0.07	+ 0.03	- 1 0.05	- 6 35 30.29
		E	...	...	...	58.00	58.00	29.054	225 22 5.08	+ 4.01	- 0.03	+ 1 0.05	
15	θ Piscium	W	...	23 23	...	53.00	53.95	30.829	146 46 7.52	- 0.25	- 0.03	- 38.48	+ 5 49 37.03
		E	...	...	...	58.00	58.40	27.833	212 58 7.78	+ 4.19	+ 0.03	+ 38.48	
16	ι Piscium	W	...	23 35	...	52.95	53.95	29.792	146 2 7.78	- 0.28	- 0.03	- 39.59	+ 5 4 53.39
		E	...	...	...	57.80	58.05	28.931	213 42 6.15	+ 3.93	+ 0.03	+ 39.58	
17	Groombridge 4163	W	...	23 50	...	52.70	53.25	31.331	214 46 6.98	- 0.73	- 1.10	+ 41.25	+73 51 14.07
		E	...	...	...	58.15	58.05	30.378	144 56 6.52	+ 4.10	+ 1.10	- 41.25	
18	33 Piscium	W	...	0 0	...	53.05	53.95	31.667	134 40 4.22	- 0.23	+ 0.03	- 59.43	- 0 16 14.31
		E	...	...	...	57.95	57.95	30.127	225 2 6.18	+ 3.95	- 0.03	+ 59.43	
19	μ Andromedæ	W	...	0 51	...	52.80	53.50	29.408	178 54 10.15	- 0.57	- 0.26	+ 1.00	+37 57 21.42
		E	...	...	...	58.10	57.85	29.038	180 50 8.78	+ 3.98	+ 0.26	+ 1.00	
20	β Andromedæ	W	...	1 4	...	52.75	53.60	29.585	176 2 9.35	- 0.53	- 0.23	+ 3.98	+35 5 21.26
		E	...	...	...	57.45	57.50	29.061	183 42 9.30	+ 3.41	+ 0.23	+ 3.98	

Time	Ther. (898)	Att. ther.	Barom.	Observation made at IX with movable thread except as noted below	No.	Zenith point	Red. to Equator
1 16	41.6	...	...	1. Observation assumed as at IX	1	129 55 8.11	...
2 16	41.6	...	...	2. Observation assumed as at XI with fixed thread	2	6.14	...
3 16	41.7	...	...	3. Observation assumed as at IV with fixed thread	3	6.12	...
4 16	41.5	...	...		4	8.46	...
5 16	41.5	...	...		5	8.14	...
6 16	41.9	...	...		6	8.24	...
7 16	41.7	...	...		7	12.02	...
8 16	41.5	42.0	30.072		8	10.40	...
9 16	41.5	41.7	30.112		9	7.08	...
10 16	40.8	40.0	29.935		10	6.49	...
11 16	40.7	45.0	29.950		11	6.06	...
12 16	40.7	...	...		12	5.93	...
13 16	40.4	...	...		13	7.14	...
14 16	40.4	...	...		14	7.65	-25.61
15 16	40.4	...	...		15	6.48	...
16 16	40.0	...	...		16	6.88	...
17 16	41.0	...	...		17	7.10	...
18 16	41.8	...	...		18	7.06	26.94
19 16	41.9	42.5	30.010		19	7.61	...
20 16	40.6	...	...		20	7.10	...
1 17	40.1	...	...		

Note

1. E. One level reading increased 10 div

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	α Ursæ Minoris	E		1 21 3.0	2 18.2	57.30	57.05	.....	130 5 12.54	+ 4.38	+ 0.22	-1 10.26	+88 46 20.76
		W		1 26 44.0	3 22.8	53.00	53.80	.....	229 45 4.60	+ 0.54	- 0.48	+1 10.26	
2	12 Canum Venat.	W		12 51		54.00	55.20	27.058	179 50 7.12	- 0.42	- 0.27	- 0.06	+38 51 42.75
		E				56.55	57.10	28.698	179 56 5.32	+ 1.67	+ 0.27	+ 0.06	
3	α Ursæ Minoris s. p.	W		13 20 19.0	3 3.1	54.15	54.65	.....	232 12 12.20	+ 0.26	+ 0.39	+1 16.35	+88 46 23.59
	November 15, H.	E		13 26 0.0	2 37.9	55.90	56.65	.....	127 38 4.42	+ 2.02	- 0.29	-1 16.35	
4	α Cygni	W		20 38		53.95	55.00	29.521	185 52 8.05	+ 0.50	- 0.34	+ 6.17	+44 55 28.53
		E				57.80	58.60	29.139	173 52 8.12	+ 4.01	+ 0.34	- 6.18	
5	ϵ Cephei	W		22 46		53.75	54.95	30.521	206 36 5.95	+ 0.38	- 0.75	+ 29.82	+65 40 32.62
		E				57.90	58.35	28.159	153 8 5.15	+ 3.94	+ 0.75	- 29.83	
6	α Andromedæ	W		22 57		53.70	54.65	29.252	182 44 7.95	+ 0.22	- 0.30	+ 2.96	+41 47 17.94
		E				57.95	57.95	29.219	177 0 8.60	+ 3.77	+ 0.30	- 2.97	
7	γ Pegasi	W		23 16		53.95	54.60	30.100	164 8 7.08	+ 0.31	- 0.14	- 16.64	+23 11 30.07
		E				57.45	57.70	28.562	195 36 6.48	+ 3.41	+ 0.14	+ 16.64	
8	ω Piscium	W		23 54		53.55	54.40	29.040	147 16 6.78	+ 0.03	- 0.03	- 37.84	+ 6 18 25.11
		E				57.30	57.45	29.698	212 28 4.52	+ 3.23	+ 0.03	+ 37.84	
9	γ Pegasi	W		0 8		53.80	54.50	30.457	155 34 5.15	+ 0.19	- 0.08	- 26.71	+14 37 31.42
		E				57.10	57.80	28.354	204 10 4.88	+ 3.31	+ 0.08	+ 26.71	
10	π Andromedæ	W		0 32		52.85	54.25	30.696	174 6 7.18	- 0.37	- 0.22	- 5.97	+33 10 3.99
		E				57.50	58.25	27.999	185 38 6.28	+ 3.71	+ 0.22	+ 5.97	
11	μ Andromedæ	W		0 51		53.20	54.05	29.489	178 54 7.78	- 0.31	- 0.26	- 1.00	+37 57 23.00
		E				57.60	58.05	29.031	180 50 7.42	+ 3.65	+ 0.26	+ 1.00	
12	β Andromedæ	W		1 4		53.45	54.05	29.590	176 2 7.35	- 0.19	- 0.23	- 3.97	+35 5 20.60
		E				57.25	57.90	29.079	183 42 8.42	+ 3.42	+ 0.23	+ 3.97	
13	α Ursæ Minoris	W		1 19 8.0	4 24.3	54.25	54.50	.....	229 45 5.80	+ 0.98	- 0.83	+1 10.29	+88 46 21.62
	November 19, H.	E		1 28 39.0	5 6.7	56.90	56.95	.....	130 5 12.20	+ 3.39	+ 1.11	-1 10.29	
14	α Pegasi	W		23 0		54.10	54.75	28.018	155 38 5.62	+ 0.31	- 0.08	- 25.79	+14 39 54.92
		E				58.40	58.65	27.711	204 8 6.10	+ 4.17	+ 0.08	+ 25.79	
15	ϕ Aquarii	W		23 9		53.85	54.55	29.719	134 22 3.90	+ 0.09	+ 0.03	- 58.21	+ 6 35 31.58
		E				58.40	58.50	29.108	225 22 5.02	+ 4.10	- 0.03	+ 58.22	
16	ω Piscium	W		23 54		54.00	54.60	29.011	147 16 6.42	+ 0.19	- 0.03	- 36.67	+ 6 18 25.03
		E				58.50	58.50	29.682	212 28 4.98	+ 4.15	+ 0.03	+ 36.67	
17	σ Andromedæ	W		0 13		53.10	54.10	30.188	177 10 8.22	- 0.47	- 0.24	- 2.70	+36 13 48.02
		E				58.90	58.95	28.353	182 34 7.82	+ 4.55	+ 0.24	+ 2.70	
18	12 Ceti	W		0 25		53.45	54.30	30.633	136 26 4.78	- 0.21	+ 0.02	- 54.30	- 4 30 48.03
	November 20, H.	E				58.05	58.35	28.106	223 18 5.98	+ 3.87	- 0.02	+ 54.30	
19	α Cygni	W		20 38		52.80	53.75	29.480	185 52 8.85	- 0.56	- 0.34	+ 6.08	+44 55 27.08
		E				56.95	57.40	29.161	173 52 9.28	+ 3.11	+ 0.34	- 6.08	

Time	Ther 3882.	Alt. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1868 0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>				
11 1 15		40.5	30.050	1,3. Observation assumed as at IV with fixed thread.	1	179 55 10.93	
1 24	40.5			13. Observation assumed as at VI with fixed thread.	2	4.36	
12 40	42.5	39.0	30.156		3	9.60	
13 24	44.1				4	7.16	
14 45		42.0	30.164		5	4.93	
15 20 28	45.6	46.2	30.040		6	3.23	
22 35	41.9	42.5	30.043		7	5.49	
22 57	41.8				8	5.86	
23 16	42.7				9	6.66	
23 54	41.9				10	5.93	
0 8	41.9				11	3.23	
0 17	41.2	40.5	30.046		12	6.60	
0 31	36.9				13	11.32	
1 4	40.9				14	5.08	
1 24	40.2				15	6.79	25.27
1 38		40.5	30.056	Note.	16	5.16	
19 22 45	48.9	49.0	29.474	4 9.10. Poor.	17	4.46	37.51
21 9	48.9				18	5.65	
21 54	48.9				19	6.96	
0 13	48.7						
0 33	48.7	48.9	29.568				
20 20 14	50.0	51.0	29.572				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	θ Aquarii	W E	...	22 12	...	53.35 50.55	54.55 57.15	30.446 28.405	132 40 5.12 227 4 4.18	+0.08 +2.81	+0.04 -0.04	-1 2.92 +1 2.92	-8 17 5.41
2	π Aquarii	W E	...	22 20	...	53.45 50.75	54.55 57.00	31.608 27.115	141 48 5.05 217 56 6.82	+0.13 +2.83	0.00 0.00	+45.67 +45.68	+0 52 0.51
3	226 B. Cephei	W E	...	22 30	...	53.40 57.10	53.95 57.85	30.500 28.250	216 38 5.98 143 6 6.55	-0.19 +3.39	+1.32 +1.32	+43.67 -43.66	+75 42 42.90
4	ϵ Cephei	W E	...	22 46	...	53.40 50.95	54.15 57.40	30.552 28.129	206 36 6.28 153 8 7.72	-0.09 +3.11	-0.75 +0.75	+29.49 -29.49	+65 40 32.58
5	α Pegasi	W E	...	23 0	...	53.60 56.80	54.50 57.45	27.971 27.719	155 38 7.45 204 8 6.45	+0.17 +3.07	-0.08 +0.08	-26.36 +26.36	+14 39 54.44
6	ϕ Aquarii	W E	...	23 9	...	53.95 50.85	54.55 57.20	29.776 29.080	134 22 3.52 225 22 6.32	+0.35 +2.97	+0.03 -0.03	+59.51 +59.52	-0 35 31.29
7	θ Piscium	W E	...	23 23	...	53.90 50.75	54.45 57.45	30.796 27.869	146 46 7.90 212 58 7.22	+0.29 +3.05	-0.03 +0.03	+38.10 +38.10	+5 49 37.19
8	ϵ Piscium	W E	...	23 35	...	53.95 50.75	54.45 57.05	29.785 28.979	146 2 7.50 213 42 5.65	+0.31 +2.85	-0.03 +0.03	-39.24 +39.25	+5 4 53.53
9	β Cassiopeiæ	W E	...	0 4	...	53.35 57.00	54.00 57.15	29.845 28.908	199 32 7.65 160 12 6.50	-0.10 +3.01	-0.55 +0.55	+20.97 -20.97	+58 35 55.21
10	π Andromedæ	W E	...	0 32	...	53.75 50.95	54.20 57.10	30.691 27.950	174 6 8.30 185 38 7.82	+0.09 +2.97	-0.22 +0.22	+5.91 +5.92	+33 10 5.33
11	δ Piscium	W E	...	0 44	...	53.45 56.60	54.05 57.00	31.878 29.856	147 58 6.50 211 44 8.20	-0.11 +2.75	-0.04 +0.04	+30.50 +30.50	+7 2 19.17
12	μ Andromedæ	W E	...	0 51	...	53.25 57.00	54.05 57.35	29.401 29.023	178 54 11.45 180 50 10.62	0.21 +3.11	-0.26 +0.26	+0.90 +0.99	+37 57 21.91
13	β Andromedæ	W E	...	1 4	...	53.25 56.85	54.20 57.15	29.621 26.138	176 2 8.08 183 44 8.20	-0.13 +2.95	-0.23 +0.23	-3.94 +3.94	+35 5 22.03
14	α November 25, H. Cygni	W E	...	20 38	...	51.75 56.00	50.75 53.95	29.580 29.220	185 32 5.20 173 52 7.12	-0.37 +3.13	-0.34 +0.34	+6.30 -6.29	+44 55 27.27
15	θ Cephei	W E	...	23 15	...	52.10 56.10	50.45 54.15	29.547 29.172	208 30 6.98 151 14 6.30	-0.35 +3.27	-0.82 +0.82	+33.07 -33.07	+67 33 55.10
16	Groombridge 4103	W E	...	23 50	...	52.20 55.60	50.85 54.20	31.347 30.304	214 46 7.02 144 56 9.60	-0.11 +3.07	-1.16 +1.16	+42.16 -42.16	+73 51 10.09
17	δ Piscium	W E	...	0 0	...	52.95 55.95	51.45 54.20	31.675 30.190	134 40 3.00 225 2 3.70	+0.52 +3.23	+0.03 -0.03	+0.77 +0.79	0 16 15.47
18	γ November 30, H. Cephei	W E	...	23 35	...	52.15 57.10	50.60 55.05	30.163 28.691	218 0 5.12 141 44 4.38	-0.44 +3.99	-1.46 +1.46	+46.01 +46.00	+77 4 29.42
19	ω Piscium	W E	...	23 54	...	52.95 56.80	50.85 54.80	29.099 29.711	147 16 5.32 212 28 5.12	+0.05 +3.73	-0.03 +0.03	+37.47 +37.47	+0 18 24.92

Time	Ther (882)	Att. ther	Barom	Observation made at IX with movable thread, except as noted below	No	Zenith point	Red. to 1898.0
1 0 10	46.1	47.0	29.960	Observation assumed as at IX.	1	179 55	6.82
1 21 17	46.1				2		5.51
1 25 25	46.1				3		6.71
1 30 35	46.6				4		5.76
1 35 46	44.9				5		4.75
1 40 5	46.1				6		7.40
1 45 9	44.9				7		6.13
1 50 23	44.1				8		7.10
1 55 41	44.7	44.5	29.917		9		7.20
2 0 1	44.9				10		6.07
2 5 31	41.8				11		8.26
2 10 44	41.7				12		4.48
2 15 51	41.1				13		7.14
2 20 4	41.0				14		7.21
2 25 17	16.9	41.3	29.925	Note	15		6.13
2 30 17	15.5	35.5	16.867	18 19 Unsteady	16		7.69
2 35 2	16.4	10.5	16.929		17		7.50
2 40 10	11.6				18		7.10
2 45 6	11.1				19		6.99
2 50 20	11.5	10.0	16.907				
2 55 21	15.0	19.0	29.607				
3 0 51	15.1						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° / "</i>
1	22 Andromedæ	W	...	0 5	...	52.80	50.50	28.778	186 28 6.95	- 0.19	- 0.35	+ 6.77	+45 30 50.87
		E	...	...	...	57.30	54.95	29.939	173 16 7.75	+ 4.03	+ 0.35	- 6.77	
2	44 Piscium	W	...	0 20	...	53.00	50.85	30.041	142 20 6.50	+ 0.07	0.00	- 44.94	+ 1 22 57.26
		E	...	...	...	56.80	54.90	28.692	217 24 6.80	+ 3.77	0.00	+ 44.94	
3	π Andromedæ	W	...	0 32	...	52.00	50.60	30.711	174 6 8.32	- 0.09	- 0.22	- 5.90	+33 10 6.24
		E	...	...	...	56.05	54.80	27.885	185 38 8.58	+ 3.66	+ 0.22	+ 5.90	
4	μ Andromedæ	W	...	0 51	...	52.90	50.75	29.556	178 54 9.12	- 0.03	- 0.26	0.99	+37 57 25.50
		E	...	...	...	57.90	54.95	28.993	180 50 7.60	+ 4.31	+ 0.26	+ 0.99	
5	β Andromedæ	W	...	1 4	...	52.40	50.65	29.658	176 2 8.18	- 0.30	- 0.23	- 3.93	+35 5 23.18
		E	...	...	...	57.10	55.10	29.050	183 42 7.35	+ 4.01	+ 0.23	+ 3.93	
6	December 1, H. α Cygni	W	...	20 38	...	42.50	50.05	29.498	185 52 6.08	- 0.61	- 0.34	+ 6.08	+44 55 25.40
		E	...	...	...	44.95	52.05	29.235	173 52 8.70	+ 1.48	+ 0.34	- 6.08	
7	θ Piscium	W	...	23 23	...	50.45	50.95	30.783	146 46 8.60	- 0.02	- 0.03	- 38.40	+ 5 49 36.83
		E	...	...	...	54.85	53.70	27.860	212 58 7.42	+ 3.33	+ 0.03	+ 38.40	
8	ι Piscium	W	...	23 35	...	50.00	50.80	29.835	146 2 5.55	- 0.31	- 0.03	- 39.52	+ 5 4 52.68
		E	...	...	...	54.00	54.40	28.971	213 42 6.08	+ 3.28	+ 0.03	+ 39.53	
9	Groombridge 4163	W	...	23 50	...	49.80	50.60	31.409	214 46 7.80	- 0.49	1.16	+ 41.20	+73 51 18.21
		E	...	...	...	54.55	54.05	30.241	144 56 8.32	+ 3.65	+ 1.16	- 41.20	
10	33 Piscium	W	...	0 0	...	50.10	50.90	31.649	134 40 2.50	- 0.21	+ 0.03	- 59.40	- 6 16 15.90
		E	...	...	...	54.05	54.45	30.228	225 2 3.48	+ 3.33	- 0.03	+ 59.40	
11	σ Andromedæ	W	...	0 13	...	50.45	50.80	30.246	177 10 6.80	- 0.09	- 0.24	- 2.78	+36 13 47.48
		E	...	...	...	54.40	54.50	28.482	182 34 7.55	+ 3.51	+ 0.24	+ 2.78	
12	ι2 Ceti	W	...	0 25	...	50.50	51.10	30.656	136 26 5.80	+ 0.07	+ 0.02	- 55.80	- 4 30 49.22
		E	...	...	...	54.55	54.45	28.215	223 18 2.00	+ 3.55	- 0.02	+ 55.90	
13	δ Piscium	W	...	0 44	...	50.55	51.15	31.825	147 58 5.05	+ 0.12	- 0.04	- 36.71	+ 7 2 17.42
		E	...	...	...	54.45	54.40	29.870	211 44 6.50	+ 3.49	+ 0.04	+ 36.71	
14	β Andromedæ	W	...	1 4	...	50.40	50.60	29.637	176 2 9.12	- 0.21	- 0.23	- 3.96	+35 5 22.15
		E	...	...	...	53.95	54.30	26.129	183 44 9.58	+ 3.21	+ 0.23	+ 3.96	
15	12 Canum Venat.	W	...	12 51	...	51.70	52.15	26.878	179 50 6.95	- 0.59	- 0.27	- 0.07	+38 51 36.03
		E	...	...	...	54.15	54.00	28.860	179 50 4.58	+ 1.43	+ 0.27	+ 0.06	
16	December 7, H. α Cygni	W	...	20 38	...	50.85	50.05	32.438	185 50 6.00	- 0.54	- 0.34	+ 6.16	+44 55 25.04
		E	...	...	...	54.05	53.05	32.218	173 50 6.00	+ 2.00	+ 0.34	- 6.16	
17	December 9, H. α Cygni	W	...	20 38	...	49.40	48.80	29.539	185 52 5.12	- 0.59	- 0.34	+ 6.39	+44 55 24.32
		E	...	...	...	56.20	55.00	29.257	173 52 7.25	+ 5.53	+ 0.34	- 6.39	
18	December 10, H. α Cygni	W	...	20 38	...	49.45	49.40	29.569	185 52 4.90	- 0.56	- 0.34	+ 6.15	+44 55 24.46
		E	...	...	...	55.55	54.80	29.310	173 52 6.05	+ 4.85	+ 0.34	- 6.15	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1882.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° / "</i>	
30 0 5	38.6			9. Observation assumed as at IX.	1	179 55 7.25	-40.31
0 20	38.8				2	6.87	
0 32	38.9				3	5.74	
0 51	38.5				4	5.04	
1 4	37.8				5	7.42	
1 41	...	36.0	29.525		6	6.14	
1 20 25	48.1	48.0	29.718		7	6.14	
21 5	38.8	41.5	29.804		8	7.10	
21 35	39.4				9	7.52	
21 50	39.1				10	7.00	-26.61
0 0	38.9				11	7.10	-38.27
0 13	38.8				12	6.84	
0 25	38.7				13	6.38	
0 44	39.1			Notes	14	8.59	
1 4	38.9			Unsteady.	15	3.33	
1 38	...	38.0	29.866	Poor	16	6.02	
12 45	29.0	31.0	29.911		17	8.26	
7 20 25	42.1	42.0	29.787		18	8.91	
9 20 45	42.1	42.0	29.717				
10 20 45	42.2	41.8	29.715				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
1	December 11, H. α Cygni	W E	...	<i>h m s</i> 20 38	<i>m s</i> ...	<i>d</i> 51.10 54.70	<i>d</i> 51.15 53.70	<i>r</i> 29.432 29.283	<i>° ' "</i> 185 52 6.98 173 52 8.15	<i>"</i> - 0.47 + 2.43	<i>"</i> - 0.34 + 0.34	<i>"</i> + 6.02 - 6.02	<i>° ' "</i> +44 55 23.32
2	December 13, H. α Cygni	W E	...	20 38	...	50.65 55.05	50.40 54.40	29.401 29.221	185 52 8.40 173 52 10.08	- 0.49 + 3.75	- 0.34 + 0.34	+ 6.34 - 6.34	+44 55 23.34
3	December 14, H. α Cygni	W E	...	20 38	...	51.15 55.35	51.15 54.30	29.472 29.520	185 52 6.08 173 51 58.48	- 0.49 + 2.97	- 0.34 + 0.34	+ 6.41 - 6.42	+44 55 23.79
4	December 15, H. α Cygni	W E	...	20 38	...	51.35 55.90	50.95 54.80	29.439 29.271	185 52 6.48 173 52 8.58	- 0.56 + 3.39	- 0.34 + 0.34	+ 6.30 - 6.30	+44 55 22.99
5	December 16, H. α Cygni	W E	...	20 38	...	50.80 54.00	50.90 54.35	29.449 29.311	185 52 6.10 173 52 7.40	- 0.63 + 2.78	- 0.34 + 0.34	+ 6.16 - 6.16	+44 55 22.90
6	December 23, H. α Cygni	W E	...	20 38	...	58.40 55.50	57.10 53.40	29.358 29.520	185 52 3.62 173 52 1.60	+ 2.57 - 0.55	- 0.34 + 0.34	+ 6.08 - 6.08	+44 55 21.42
7	December 29, H. α Cygni	W E	...	20 38	...	56.25 56.40	53.85 54.55	29.482 29.409	185 52 3.52 173 52 7.65	- 0.59 - 0.19	- 0.34 + 0.34	+ 5.96 - 5.96	+44 55 21.46

Time	Ther. 1882	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.								No.	Zenith point	Red. to 1898 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>										<i>° ' "</i>	<i>"</i>
11 20 17	46.9	43.5	29.360									1	179 55 0.50	.....
11 20 45	29.9	29.0	29.840									2	6.92	.....
11 20 45	31.0	29.0	30.250									3	7.17	.....
11 20 25	39.1	36.0	30.217									4	6.80	.....
11 20 10	48.9	44.6	30.176									5	6.68	.....
11 20 45	49.1	49.0	29.797									6	6.08	.....
29 20 27	57.7	51.5	29.715									7	0.24	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.	
	January 19, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>	
1	α Cygni	W E	...	20 38	...	53.05 49.30	52.15 48.10	29.269 29.750	185 52 173 52	1.80 1.50	+ 3.02 - 0.66	- 0.34 + 0.34	+ 6.34 - 6.35	+44 55 14.73
2	β Persei	W E	...	3 2	...	51.50 49.35	51.00 48.95	30.754 28.053	181 30 178 14	1.88 2.22	+ 1.53 - 0.45	- 0.29 + 0.29	+ 1.75 - 1.76	+40 34 13.98
3	α Persei	W E	...	3 17	...	51.55 49.70	50.90 48.85	30.803 28.073	190 26 169 18	3.85 4.52	+ 1.51 - 0.33	- 0.39 + 0.39	+ 11.38 - 11.38	+49 30 23.85
4	ϵ Eridani	W E	...	3 28	...	52.55 49.45	51.45 48.50	32.139 29.780	131 8 228 34	0.88 59.82	+ 2.24 - 0.61	+ 0.06 - 0.06	- 9.22 + 9.20	- 9 48 2.49
5	η Tauri	W E	...	3 42	...	52.15 49.55	51.25 49.10	30.600 31.394	164 44 194 58	0.80 1.12	+ 1.96 - 0.28	- 0.15 + 0.15	- 16.47 + 16.47	+23 47 44.67
6	α Cygni	W E	...	20 38	...	53.65 50.50	52.55 48.85	29.162 29.725	185 52 173 52	2.20 1.88	+ 2.62 - 0.61	- 0.34 + 0.34	+ 6.22 - 6.22	+44 55 12.71
7	α Cygni	W E	...	20 38	...	53.00 49.85	51.65 48.25	29.252 29.762	185 52 173 51	1.15 59.72	+ 2.63 - 0.45	- 0.34 + 0.34	+ 6.12 - 6.12	+44 55 14.17
8	α Persei	W E	...	3 17	...	50.95 51.25	45.50 45.55	30.867 27.970	190 26 169 18	3.38 6.28	- 0.51 - 0.35	- 0.39 + 0.39	+ 10.82 - 10.82	+49 30 24.60
9	δ Persei	W E	...	3 36	...	51.05 51.70	45.55 45.80	30.494 28.339	188 24 171 20	5.45 4.38	- 0.45 - 0.03	- 0.37 + 0.37	+ 8.71 - 8.71	+47 28 9.21
10	γ Tauri	W E	...	4 14	...	51.30 50.80	45.55 45.75	29.820 29.155	156 20 203 24	3.85 2.02	- 0.33 - 0.47	- 0.08 + 0.08	- 25.27 + 25.27	+15 23 5.76
11	α Tauri	W E	...	4 30	...	51.50 50.95	46.05 45.35	31.819 30.077	157 14 202 28	1.80 2.52	+ 0.01 - 0.59	- 0.09 + 0.09	- 24.22 + 24.22	+16 18 27.75
12	θ Camelop.	W E	...	4 44	...	51.50 51.50	45.95 45.60	30.683 28.339	207 6 152 38	1.22 3.52	- 0.05 - 0.21	- 0.77 + 0.77	+ 29.96 - 29.96	+66 10 32.53
13	γ Tauri	W E	...	4 14	...	51.05 51.00	45.50 45.45	29.854 29.140	156 20 203 24	3.35 1.68	- 0.37 - 0.43	- 0.08 + 0.08	- 25.63 + 25.63	+15 23 6.27
14	α Tauri	W E	...	4 30	...	51.20 51.50	45.45 45.50	31.856 30.087	157 14 202 28	1.88 1.88	- 0.33 - 0.17	- 0.09 + 0.09	- 24.53 + 24.53	+16 18 27.97
15	θ Camelop.	W E	...	4 44	...	50.90 51.90	45.15 45.90	30.669 28.332	207 6 152 38	2.08 2.98	- 0.61 + 0.21	- 0.77 + 0.77	+ 30.32 - 30.32	+66 10 32.95
16	β Orionis	W E	...	5 10	...	50.90 50.80	46.00 45.95	30.521 31.655	132 38 227 4	3.82 4.90	- 0.21 - 0.27	+ 0.04 - 0.04	- 3.59 + 3.59	- 8 19 10.66
17	β Tauri	W E	...	5 20	...	50.90 50.85	45.35 45.75	29.972 32.005	169 28 190 14	7.88 7.62	- 0.52 - 0.35	- 0.18 + 0.18	- 10.82 + 10.82	+28 31 24.09
18	ϵ Orionis	W E	...	5 31	...	51.60 50.95	45.95 45.80	31.753 30.299	139 40 220 2	7.22 5.85	+ 0.09 - 0.27	+ 0.01 - 0.01	- 49.74 + 49.73	- 1 16 2.63
19	α Cygni	W E	...	20 38	...	54.05 48.55	54.45 48.90	29.179 29.830	185 52 173 52	7.72 8.50	+ 4.48 - 0.73	- 0.34 + 0.34	+ 6.20 - 6.20	+44 55 11.33
	January 20, H.													
	January 21, H.													
	January 22, H.													
	January 23, H.													
	January 25, H.													

Time.	Ther. 1887.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.						No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
19 20 42	31.0	32.0	30.074							1	179 55	6.97
2 45	29.0	30.8	30.072							2		2.40
3 17	29.0									3		6.00
3 28	29.0									4		4.52
3 53	28.4	29.0	30.069							5		6.70
20 20 15	41.0	35.2	29.992							6		4.50
21 20 45	43.9	40.5	29.674							7		5.68
22 2 54	47.3	48.0	29.725							8		4.83
3 36	47.1									9		5.04
4 14	46.3									10		5.79
4 30	45.6*									11		4.76
4 52	45.8*	45.8	29.753							12		6.46
4 59	39.9	41.0	29.771							13		5.76
4 30	39.7									14		5.47
4 44	39.4									15		6.12
5 10	39.4									16		12.73
5 20	39.1									17		11.86
5 40	39.0	38.2	29.734							18		12.52
25 20 45	37.9	37.0	29.726							19		13.94

Notes.

- 4 E. One microscope reading decreased 10".
 5 E. Poor.
 8 W. One level reading increased 10 div.
 11 W. One level reading decreased 10 div.
 15. Two level readings increased 10 div. each
 Thermometer reading increased 5°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>''</i>	<i>° ' "</i>	<i>''</i>	<i>''</i>	<i>''</i>	<i>° ' "</i>
1	α Persei	W		3 17		53.20	53.50	30.825	190 26 9.35	+ 3.75	- 0.39	+ 11.12	+49 30 24.30
		E				48.50	48.95	28.124	169 18 9.95	- 0.61	+ 0.39	- 11.12	
2	5 H. Camelop.	W		3 39		52.80	52.45	29.122	211 58 8.82	+ 3.06	- 0.97	+ 37.26	+71 1 37.92
		E				49.00	49.10	26.972	147 48 9.82	- 0.31	+ 0.97	- 37.26	
3	ϵ Persei	W		3 51		52.90	52.75	29.398	180 40 12.25	+ 3.25	- 0.28	+ 0.83	+39 43 18.94
		E				48.70	49.10	26.469	179 6 11.85	- 0.45	+ 0.28	- 0.83	
4	ζ Persei	W		4 1		53.00	52.75	28.552	188 24 11.00	+ 3.30	- 0.37	+ 8.91	+47 26 49.43
		E				48.90	49.45	30.383	171 20 11.00	- 0.19	+ 0.37	- 8.91	
5	ϵ Tauri	W		4 23		53.00	53.10	30.294	159 54 11.10	+ 3.47	- 0.11	- 21.60	+18 57 30.70
		E				48.70	49.20	28.045	199 50 10.60	- 0.40	+ 0.11	+ 21.60	
6	January 27, H. Cygni	W		20 38		53.05	52.50	29.173	185 52 10.48	+ 1.83	- 0.34	+ 0.33	+44 55 11.26
		E				50.10	50.40	29.779	173 52 10.05	- 0.54	+ 0.34	- 0.33	
7	January 30, H. Cygni	W		20 38		48.55	49.20	29.289	185 52 9.50	- 0.56	- 0.34	+ 6.22	+44 55 11.13
		E				52.50	52.45	29.769	173 52 9.10	+ 2.83	+ 0.34	- 6.22	
8	α Ceti	W		2 57		50.05	50.05	31.059	144 38 11.62	- 0.35	- 0.02	- 41.84	+ 3 41 40.41
		E				52.60	52.55	30.712	215 4 11.95	+ 2.03	+ 0.02	+ 41.84	
9	48 H. Cephei	W		3 8		49.80	49.50	29.943	218 18 8.70	- 0.73	+ 1.49	+ 47.04	+77 22 15.64
		E				53.00	52.50	29.179	141 26 9.85	+ 2.19	+ 1.49	- 47.03	
10	α Persei	W		3 17		49.90	49.95	30.928	190 26 10.68	- 0.47	- 0.39	+ 11.09	+49 30 25.02
		E				53.15	52.55	28.009	169 18 11.55	+ 2.29	+ 0.39	- 11.09	
11	δ Persei	W		3 36		49.90	49.65	30.552	188 24 13.02	- 0.61	- 0.37	+ 8.92	+47 28 10.06
		E				53.00	52.80	28.279	171 20 12.95	+ 2.33	+ 0.37	- 8.92	
12	ζ Persei	W		3 48		50.05	49.60	26.662	172 34 10.82	- 0.57	- 0.21	- 7.65	+31 35 12.55
		E				52.85	52.35	26.345	187 14 13.42	+ 2.05	+ 0.21	+ 7.65	
13	January 31, H. Cygni	W		20 38		48.85	50.30	29.235	185 52 8.05	- 0.66	- 0.34	+ 6.49	+44 55 9.39
		E				50.90	52.00	29.856	173 52 7.52	+ 1.11	+ 0.34	- 6.49	
14	February 3, H. Cygni	W		20 38		47.70	48.95	29.193	185 52 12.20	- 0.71	- 0.34	+ 6.07	+44 55 10.09
		E				51.80	52.95	29.709	173 52 11.68	+ 3.11	+ 0.34	- 6.07	
15	February 21, H. Cephei	W		6 46 16.0	7 50.8	48.00	52.10		228 11 42.48	+ 7.15	- 5.88	+ 4.02	+87 12 37.92
		E		7 1 56.0	7 49.2	39.60	44.50		131 39 3.52	- 0.39	+ 5.83	- 4.00	
16	February 22, H. Cygni	W		20 38		49.80	53.55	28.948	185 52 7.80	+10.18	- 0.34	+ 0.01	+44 55 3.62
		E				38.10	42.30	30.160	173 52 6.25	- 0.63	+ 0.34	- 0.01	
17	February 24, H. Orionis	W		5 12		49.60	54.35	30.048	134 0 8.70	+11.51	+ 0.04	- 1 2.20	- 6 57 18.62
		E				36.65	42.40	28.997	225 44 9.32	- 0.23	- 0.04	+ 1 2.20	
18	χ Aurigæ	W		5 26		50.30	54.15	29.396	173 4 8.55	+11.73	- 0.21	- 7.21	+32 7 9.17
		E				37.45	42.55	29.653	186 40 9.45	+ 0.21	+ 0.21	+ 7.21	

Time.	Ther. 3892.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below						No.	Zenith point	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>''</i>
25 1 5	15.1	36.0	29.765	Observation assumed as at VIII with fixed thread.						1	179 55 13.95	
3 40	15.5									2	18.12	-21.82
1 51	15.3									3	13.25	
4 1	15.4									4	14.99	
4 23	15.2									5	14.00	
4 45		32.5	29.765							6	14.00	
27 20 41	29.0	29.2	29.740							7	13.19	
10 10 45	17.3	34.0	29.765							8	12.96	
2 49	16.1	15.6	29.744							9	10.26	
1 8	16.3									10	14.50	
1 17	16.0									11	14.16	
3 16	15.8									12	14.26	
1 58	15.2	14.0	29.714							13	13.64	
11 25 45	22.1	16.0	30.057							14	14.90	
5 29 45	48.0	45.5	29.712							15	26.36	
21 6 54	48.5	49.0	29.414							16	15.56	
22 29 29	50.2	46.1	29.572							17	19.37	+6.11
24 1 45	33.0	34.5	30.092							18	19.71	-6.27
5 26	32.7											

Note.
Unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	κ Orionis	W E	...	5 43	...	50.45 37.40	53.95 42.60	31.469 30.599	131 14 6.38 228 28 5.35	+11.71 +0.21	+0.06 -0.06	-1 8.53 +1 8.53	- 9 42 27.92
2	α Cygni	W E	...	20 38	...	60.95 49.00	60.30 49.45	28.951 30.150	185 52 7.80 173 52 6.85	+10.27 -0.47	-0.34 +0.34	+ 6.32 - 6.32	+44 55 3.86
3	February 28, H. α Cygni	W E	...	20 38	...	56.10 51.15	56.05 51.10	29.053 30.149	185 52 8.22 173 52 6.55	+3.93 -0.73	-0.34 +0.34	+ 6.20 - 6.20	+44 55 3.17
4	March 1, H. θ Aurigæ	W E	...	5 53	...	50.00 46.50	49.00 45.95	28.204 30.670	178 10 10.22 181 34 10.15	+3.04 -0.05	-0.25 +0.25	- 1.74 + 1.74	+37 12 25.76
5	η Geminorum	W E	...	6 9	...	50.35 46.00	49.10 45.10	31.229 30.742	163 28 8.78 196 14 9.05	+3.25 -0.69	-0.14 +0.14	- 17.08 + 17.08	+22 32 11.08
6	ν Geminorum	W E	...	6 23	...	50.40 46.45	49.35 45.65	28.939 30.028	161 14 7.35 198 30 9.25	+3.39 -0.21	-0.12 +0.12	- 19.60 + 19.60	+20 16 35.41
7	θ Geminorum	W E	...	6 46	...	50.05 46.15	49.20 45.95	29.109 29.803	175 2 10.98 184 42 9.05	+3.15 -0.21	-0.22 +0.22	- 4.92 + 4.92	+34 4 59.86
8	March 5, H. α Cygni	W E	...	20 38	...	50.45 45.40	49.35 44.65	28.963 30.091	185 52 7.98 173 52 8.05	+3.94 -0.66	-0.34 +0.34	+ 6.16 - 6.16	+44 55 1.58
9	March 10, H. τ Orionis	W E	...	5 12	...	48.20 53.20	50.55 55.15	30.193 28.890	134 0 12.52 225 44 11.85	-0.59 +3.93	+0.04 -0.04	-1 0.60 +1 0.60	- 6 57 19.34
10	δ Orionis	W E	...	5 27	...	48.45 53.15	50.60 55.15	31.057 30.895	140 34 11.50 219 8 12.70	-0.45 +3.91	0.00 0.00	- 48.21 + 48.21	- 0 22 31.16
11	θ Aurigæ	W E	...	5 53	...	48.65 53.65	51.05 55.40	28.332 30.529	178 10 10.52 181 34 10.75	-0.13 +4.27	-0.25 +0.25	- 1.77 + 1.77	+37 12 27.33
12	ν Orionis	W E	...	6 2	...	48.70 52.90	51.10 54.90	29.519 29.523	155 44 8.82 204 0 8.20	-0.09 +3.67	-0.08 +0.08	- 26.46 + 26.46	+14 46 48.32
13	μ Geminorum	W E	...	6 17	...	49.00 53.50	51.20 54.85	30.959 31.021	163 30 9.40 196 12 9.78	+0.09 +3.93	-0.14 +0.14	- 17.35 + 17.35	+22 33 55.64
14	March 11, H. ζ Aurigæ	W E	...	4 55	...	45.25 55.80	47.35 56.95	30.489 28.514	181 52 9.45 177 52 9.42	-0.41 +9.07	-0.29 +0.29	+ 2.01 - 2.01	+40 55 53.84
15	β Eridani	W E	...	5 3	...	45.80 55.80	48.00 56.95	30.548 28.811	135 44 4.85 224 0 3.82	+0.15 +9.07	+0.03 -0.03	- 55.40 + 55.40	- 5 13 7.32
16	ψ^1 Aurigæ	W E	...	6 17	...	46.60 55.95	48.50 56.55	28.252 27.784	190 18 9.65 169 28 9.75	+0.76 +8.95	-0.39 +0.39	+ 10.54 - 10.54	+49 20 32.08
17	γ Geminorum	W E	...	6 32	...	47.00 55.50	48.30 56.25	29.952 29.122	157 26 8.02 202 18 8.82	+0.85 +8.60	-0.10 +0.10	- 23.66 + 23.66	+16 29 5.42
18	March 15, H. α Cygni	W E	...	20 38	...	47.35 53.95	50.00 55.25	29.057 29.969	185 52 10.10 173 52 10.40	-0.41 +5.16	-0.34 +0.34	+ 6.18 - 6.18	+44 55 0.81

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.					No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	
24 5 52	32.6	33.0	30.107						1	179 55	18.23
20 45	37.0	34.0	30.243						2		18.04
28 20 22	40.9	41.0	29.904						3		16.86
1 5 24	46.9	49.0	29.786						4		12.87
6 9	46.0								5		14.62
6 32	45.8	46.5	29.724						6		12.97
7 3	45.6	45.9	29.722						7		13.44
5 20 45	41.9	41.5	29.785						8		14.51
10 4 45	44.9	46.0	30.074						9		10.12
5 27	44.2								10		17.86
5 53	43.7								11		13.64
6 2	43.3								12		14.92
6 25	42.9	43.0	30.078						13		16.20
11 4 45	55.9	53.0	29.856						14		17.60
5 3	55.7								15		20.04
6 17	54.4								16		17.80
6 50	54.1	51.0	29.841						17		18.42
15 20 45	41.9	41.0	29.880						18		16.92

Notes.
 5 Unsteady.
 14 Faint.
 18 High wind; unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	March 16, H. Cygni	W E	...	20 38 ..	...	48.70 53.15	51.40 55.35	29.048 30.048	185 52 9.08 173 52 7.95	- 0.61 + 3.35	- 0.34 + 0.34	+ 6.23 6.23	+44 55 0.59
2	March 17, H. Geminorum	W E	...	7 47 ..	...	47.30 52.50	49.70 54.55	30.249 31.052	167 58 11.35 191 44 10.98	- 0.53 + 4.19	- 0.17 + 0.17	- 12.41 + 12.41	+27 1 33.13
3	3 H. Ursæ Majoris	W E	...	8 3 ..	...	47.25 52.85	49.60 54.55	30.520 30.709	209 42 8.65 150 2 8.08	- 0.61 + 4.35	- 0.86 + 0.86	+ 33.79 - 33.78	+68 46 24.24
4	β Cancri	W E	...	8 11 ..	...	47.80 52.45	50.30 54.30	28.013 31.099	150 28 8.45 209 16 8.02	- 0.02 + 4.05	- 0.06 + 0.06	- 33.21 + 33.21	9 20 38.44
5	σ Hydræ	W E	...	8 33 ..	...	48.10 52.15	50.55 54.05	28.122 31.032	144 40 8.08 215 4 10.65	+ 0.24 + 3.79	- 0.02 + 0.02	- 41.57 + 41.57	+ 3 41 32.47
6	ε Ursæ Majoris	W E	...	8 53 ..	...	47.80 52.80	50.20 54.50	27.873 31.151	189 24 10.15 170 20 10.40	- 0.07 + 4.31	- 0.38 + 0.38	+ 9.88 - 9.88	+48 26 16.79
7	ο Leonis	W E	...	9 36 ..	...	48.20 52.70	50.65 54.30	26.822 29.341	151 20 9.88 208 26 8.80	+ 0.33 + 4.17	- 0.06 + 0.06	- 32.10 + 32.10	+10 20 51.55
8	March 19, H. Cygni	W E	...	20 38 ..	...	49.45 50.50	51.65 52.65	29.029 30.163	185 52 7.30 173 52 6.00	- 0.73 + 0.23	- 0.34 + 0.34	+ 6.19 - 6.19	+44 54 59.39
9	March 23, H. Cygni	W E	...	20 38 ..	...	46.10 53.35	47.90 54.05	28.994 29.998	185 52 11.92 173 52 11.05	- 0.47 + 5.85	- 0.34 + 0.34	+ 6.26 - 6.27	+44 54 59.23
10	March 24, H. Geminorum	W E	...	7 39 ..	...	50.95 57.85	51.35 57.50	28.211 30.730	169 14 13.52 190 30 12.35	- 0.39 + 5.75	- 0.18 + 0.18	- 11.18 + 11.18	+28 16 11.25
11	ω ¹ Cancri	W E	...	7 54 ..	...	51.60 57.90	51.50 57.25	28.093 30.830	166 38 12.80 193 6 12.55	- 0.02 + 5.65	- 0.16 + 0.16	- 14.02 + 14.02	+25 40 3.76
12	σ Hydræ	W E	...	8 33 ..	...	51.85 58.00	51.85 56.95	28.039 30.972	144 40 12.48 215 4 10.85	+ 0.26 + 5.55	- 0.02 + 0.02	- 42.09 + 42.09	+ 3 41 32.60
13	March 31, H. 26 Lynceis	W E	...	7 47 ..	...	44.45 52.30	48.20 53.15	29.879 29.007	188 46 12.82 170 58 13.05	- 0.47 + 6.51	- 0.37 + 0.37	+ 8.83 - 8.83	+47 49 30.20
14	3 H. Ursæ Majoris	W E	...	8 3 ..	...	45.05 52.75	48.40 55.45	30.558 28.484	209 42 11.52 150 2 12.30	- 0.09 + 6.85	- 0.86 + 0.86	+ 32.42 - 32.42	+68 46 26.58
15	η Cancri	W E	...	8 27 ..	...	45.45 51.95	48.65 55.05	29.490 29.460	161 44 12.45 198 0 12.75	+ 0.21 + 6.29	- 0.13 + 0.13	- 18.55 + 18.55	+20 46 55.47
16	ε Ursæ Majoris	W E	...	8 52 ..	...	45.85 52.25	49.00 55.10	30.802 31.049	189 22 14.58 170 20 13.62	+ 0.57 + 6.46	- 0.38 + 0.38	+ 9.52 - 9.52	+48 26 18.18
17	α Cancri	W E	...	9 2 ..	...	46.05 51.95	49.45 54.75	28.844 30.159	152 2 12.58 207 42 12.15	+ 0.87 + 6.15	- 0.06 + 0.06	- 29.99 + 29.99	+ 11 4 17.21
18	α Lynceis	W E	...	9 15 ..	...	45.90 52.15	49.35 54.85	29.339 29.541	175 46 14.20 183 58 13.95	+ 0.76 + 6.29	- 0.23 + 0.23	- 4.08 + 4.08	+34 49 5.47
19	α Cygni	W E	...	20 38 ..	...	44.65 51.20	49.10 54.45	28.888 30.026	185 52 12.12 173 52 11.88	- 0.41 + 5.18	- 0.34 + 0.34	+ 6.19 - 6.20	+44 54 50.48

Time	Ther- 1899	At- ther	Barom	Observation made at IX with movable thread, except as noted below						No	Zenith point.	Red. to 1899 c.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm</i>									
16 20 26	40.9	38.0	29.957							1	129 55 15.89	
17 7 33	42.9	42.0	29.948							2	13 09	
8 3	42.1									3	18 08	
8 11	43.0									4	16 29	
8 47	41.9	41.5	29.917							5	18 29	+ 13.09
8 51	41.7									6	16 64	
9 47	41.1	41.0	29.887							7	17 43	
19 29 47	18.1	40.0	29.600							8	14 08	
21 46 45	14.9	16.0	29.768							9	17 78	
24 7 26	15.9	15.0	29.803							10	18 18	
7 55	15.1									11	17 69	+ 4.19
8 47	14.1	16.0	29.811							12	18 55	+ 13.12
11 7 27	16.7	18.1	29.594							13	17 38	- 3.88
8 12	55.7	16.5	29.637							14	19 01	
8 27	54.8									15	18 27	
8 53	51.9									16	19 58	
9 2	51.6									17	19 09	
9 25	51.1	13.1	29.606							18	18 02	
29 26	18.6	10.0	29.592							19	16 18	

Notes

17-12 Poor
19 E. One level reading decreased 12 div

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	46 Leonis Minoris	W	...	10 47	...	50.35	53.25	26.682	175 44 15.20	- 0.35	- 0.23	- 4.28	+34 45 21.62
		E	...	...	...	52.15	54.90	29.110	184 2 14.88	+ 1.27	+ 0.23	+ 4.28	
2	α Ursæ Majoris	W	...	10 58	...	50.20	52.95	29.502	203 14 13.40	- 0.56	- 0.64	+ 25.43	+62 17 43.57
		E	...	...	...	52.80	55.15	29.365	156 30 12.25	+ 1.69	+ 0.64	- 25.43	
3	α Cygni	W	...	20 38	...	50.60	49.95	28.938	185 52 10.38	- 0.63	- 0.34	+ 6.23	+44 54 58.90
	April 10, H.	E	...	...	...	53.10	52.05	30.004	173 52 11.65	+ 1.53	+ 0.34	- 6.23	
4	α Cygni	W	...	20 38	...	50.95	51.30	28.982	185 52 9.50	- 0.71	- 0.34	+ 6.24	+44 54 58.76
	April 12, H.	E	...	...	...	52.70	52.90	30.040	173 52 12.10	+ 0.87	+ 0.34	- 6.24	
5	β Cancri	W	...	8 11	...	48.25	48.55	27.843	150 28 13.98	- 0.59	- 0.06	- 31.13	+ 9 29 38.48
		E	...	...	...	52.65	52.70	30.955	209 16 16.62	+ 3.45	+ 0.06	+ 31.13	
6	γ Cancri	W	...	8 27	...	48.60	48.70	29.474	161 44 14.05	- 0.35	- 0.13	- 18.12	+20 46 56.44
		E	...	...	...	52.70	52.05	29.488	198 0 13.40	+ 3.44	+ 0.13	+ 18.12	
7	σ^2 Ursæ Majoris	W	...	9 2	...	48.85	49.00	30.965	208 28 14.62	- 0.09	- 0.81	+ 30.26	+67 32 45.97
		E	...	...	...	53.00	53.05	27.967	151 16 13.25	+ 3.77	+ 0.81	- 30.26	
8	θ Hydræ	W	...	9 9	...	49.50	49.40	28.931	143 42 11.00	+ 0.41	- 0.02	- 40.62	+ 2 44 10.26
		E	...	...	...	52.55	52.45	30.056	216 2 13.50	+ 3.27	+ 0.02	+ 40.62	
9	α Leonis	W	...	9 30	...	49.00	49.55	26.783	151 20 12.12	+ 0.24	- 0.06	- 30.28	+10 20 54.05
		E	...	...	...	52.85	52.30	29.291	208 26 10.90	+ 3.35	+ 0.06	+ 30.28	
10	α Cygni	W	...	20 38	...	50.30	50.55	30.068	185 58 10.55	- 0.51	- 0.34	+ 5.97	+44 54 58.40
	April 13, H.	E	...	...	...	52.30	51.70	30.019	173 52 10.45	+ 0.97	+ 0.34	- 5.98	
11	β Canis Minoris	W	...	7 22	...	47.40	47.40	27.650	149 28 10.65	- 0.29	- 0.05	- 32.00	+ 8 29 25.80
		E	...	...	...	55.20	54.30	31.270	210 16 13.30	+ 6.63	+ 0.05	+ 32.00	
12	α Canis Minoris	W	...	7 34	...	48.00	47.50	29.850	146 26 9.45	+ 0.03	- 0.03	- 35.98	+ 5 28 51.17
		E	...	...	...	56.15	54.25	29.148	213 18 10.20	+ 7.04	+ 0.03	+ 35.99	
13	ρ Argûs	W	...	8 0 44.0	3 27.2	49.05	48.45		117 0 31.15	+ 1.70	+18.68	- 46.84	-24 1 6.58
		E	...	8 7 17.0	3 5.8	55.40	54.05		242 50 11.78	+ 7.32	-15.02	+ 46.87	
14	α Monocerotis	W	...	8 21	...	49.45	48.55	30.667	137 22 7.42	+ 1.20	+ 0.02	- 50.25	- 3 34 51.80
	April 16, H.	E	...	...	...	54.05	53.80	28.400	222 22 11.30	+ 6.13	- 0.02	+ 50.26	
15	α Leonis	W	...	9 30	...	46.80	48.80	26.972	151 20 11.12	+ 0.05	- 0.01	- 31.74	+10 2

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	April 17, H. α Cygni	W E	...	20 38	...	46. 60 54. 95	48. 60 56. 75	28. 998 29. 922	185 52 9. 92 173 52 10. 98	- 0. 68 + 7. 10	- 0. 34 + 0. 34	+ 6. 10 - 6. 10	+44 54 59. 03
2	April 19, H. π Virginis	W E	...	11 56	...	52. 85 60. 80	51. 15 57. 65	29. 059 29. 921	148 8 9. 05 211 36 8. 45	+ 0. 60 + 7. 40	- 0. 04 + 0. 04	- 35. 11 + 35. 11	+ 7 10 20. 70
3	α Cygni	W E	...	20 38	...	52. 65 59. 05	50. 90 56. 75	28. 964 29. 951	185 52 9. 65 173 52 9. 78	- 0. 47 + 5. 59	- 0. 34 + 0. 34	+ 6. 07 - 6. 07	+44 54 59. 05
4	April 20, H. θ Hydræ	W E	...	9 9	...	52. 40 60. 30	51. 05 57. 95	28. 950 29. 939	143 42 11. 12 216 2 12. 62	- 0. 32 + 6. 65	- 0. 02 + 0. 02	- 41. 11 + 41. 11	+ 2 44 11. 00
5	ϵ Leonis	W E	...	9 40	...	53. 10 60. 55	51. 40 57. 50	28. 357 30. 579	165 12 10. 72 194 32 10. 88	+ 0. 17 + 6. 55	- 0. 15 + 0. 15	- 14. 80 + 14. 80	+24 14 12. 97
6	19 Leonis Minoris	W E	...	9 51	...	52. 70 60. 70	51. 00 57. 55	30. 682 28. 069	182 28 10. 75 177 16 12. 98	- 0. 21 + 6. 64	- 0. 30 + 0. 30	+ 2. 58 - 2. 58	+41 32 7. 66
7	α Leonis	W E	...	10 3	...	52. 85 59. 85	51. 15 57. 00	27. 492 28. 463	153 26 11. 22 206 20 10. 62	- 0. 07 + 5. 98	- 0. 07 + 0. 07	- 28. 17 + 28. 17	+12 27 25. 76
8	μ Hydræ	W E	...	10 19 18. 0 10 25 7. 0	2 53. 8 2 55. 2	53. 50 59. 95	51. 60 57. 05	..... .....	124 41 37. 74 235 0 2. 88	+ 1. 18 + 6. 78	+14. 97 -15. 22	-1 21. 68 +1 21. 70	-16 19 35. 40
9	41 Leonis Minoris	W E	...	10 37	...	52. 60 59. 20	51. 15 56. 65	29. 253 29. 722	164 40 10. 92 195 4 8. 95	- 0. 19 + 5. 51	- 0. 15 + 0. 15	- 15. 44 + 15. 44	+23 42 49. 53
10	6 H ¹ . Draconis	W E	...	10 51	...	52. 50 59. 40	51. 10 56. 60	30. 709 31. 354	219 14 8. 78 140 28 9. 88	- 0. 25 + 5. 59	- 1. 62 + 1. 62	+ 46. 62 - 46. 62	+78 18 44. 91
11	ρ^4 Leonis	W E	...	11 1	...	53. 50 59. 45	51. 60 56. 75	28. 606 30. 407	143 28 8. 38 216 16 9. 75	+ 0. 45 + 5. 67	- 0. 02 + 0. 02	- 41. 97 + 41. 97	+ 2 29 54. 50
12	ν Leonis	W E	...	11 32	...	53. 55 59. 00	51. 85 56. 70	28. 453 30. 668	140 42 8. 15 219 2 6. 62	+ 0. 59 + 5. 45	0. 00 0. 00	- 46. 40 + 46. 40	- 0 16 16. 73
13	σ Virginis	W E	...	12 0	...	53. 80 58. 40	52. 25 55. 90	27. 517 28. 583	150 16 8. 92 209 30 6. 68	+ 0. 90 + 4. 78	- 0. 05 + 0. 05	- 32. 46 + 32. 46	+ 9 17 21. 47
14	α Cygni	W E	...	20 38	...	52. 95 58. 20	51. 15 56. 10	29. 098 30. 112	185 52 5. 32 173 52 4. 60	- 0. 66 + 4. 15	- 0. 34 + 0. 34	+ 6. 07 - 6. 07	+44 54 59. 54
15	April 22, H. α Cygni	W E	...	20 38	...	52. 25 58. 55	49. 35 54. 70	29. 016 30. 089	185 52 7. 90 173 52 5. 40	- 0. 49 + 4. 99	- 0. 34 + 0. 34	+ 6. 14 - 6. 14	+44 54 58. 97
16	April 23, H. ϵ Leonis	W E	...	9 40	...	51. 35 61. 20	48. 55 57. 30	28. 408 30. 540	165 12 12. 22 194 32 10. 42	- 0. 35 + 8. 41	- 0. 15 + 0. 15	- 14. 72 + 14. 72	+24 14 14. 68
17	19 Leonis Minoris	W E	...	9 51	...	51. 75 61. 45	48. 05 57. 25	30. 765 28. 131	182 28 9. 22 177 16 10. 70	- 0. 40 + 8. 51	- 0. 30 + 0. 30	+ 2. 57 - 2. 57	+41 32 7. 41
18	λ Ursæ Majoris	W E	...	10 11	...	51. 70 61. 60	48. 85 57. 25	29. 268 29. 778	184 22 9. 52 175 22 9. 32	- 0. 04 + 8. 57	- 0. 31 + 0. 31	+ 4. 42 - 4. 42	+43 25 6. 05
19	31 Leonis Minoris	W E	...	10 22	...	51. 85 61. 05	48. 85 56. 85	26. 869 20. 209	178 12 9. 82 181 34 10. 28	+ 0. 03 + 8. 13	- 0. 25 + 0. 25	- 1. 67 + 1. 67	+37 13 22. 58

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.							No.	Zenith point.	Red. to 1899 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m.</i>	8. Observation at V with fixed thread.									<i>° ' "</i>
17 20 21	49. 1	48. 5	29. 934								1	179 55	15. 28
19 12 6	59. 4	58. 0	29. 884								2		10. 10
20 22	51. 8	51. 0	29. 980								3		14. 30
20 8 68	65. 0	65. 5	29. 936								4		16. 52
9 40	62. 9										5		10. 62
9 51	62. 9										6		13. 76
10 3	61. 9										7		14. 46
10 12		60. 5	29. 954								8		24. 18
10 22	60. 0										9		15. 85
10 37	60. 6										10		18. 40
10 51	60. 0										11		10. 15
11 1	59. 2										12		16. 64
11 12	58. 8	59. 0	29. 951								13		15. 20
12 10	57. 7	58. 0	29. 947								14		14. 74
20 16	51. 0	51. 0	29. 911								15		14. 80
20 20 21	47. 9	49. 9	30. 944								16		18. 06
23 9 28	66. 2	66. 0	29. 975								17		15. 66
19 51	65. 9										18		18. 39
10 11	65. 9										19		18. 23
0 32	65. 9	61. 5	29. 970										

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W E		20 38 ..		52.15 60.60	40.10 50.55	29.088 30.019	185 52 6.48 173 52 5.58	- 0.49 + 7.00	- 0.34 + 0.34	+ 6.06 - 6.07	+44 54 59.97
2	April 24, H. 40 Lyneis	W E		9 15 ..		40.35 50.85	46.50 55.95	29.400 32.400	175 46 13.02 183 56 12.32	- 0.04 + 9.35	- 0.23 + 0.23	- 3.08 + 3.08	+34 49 6.75
3	γ Leonis (1st star)	W E		10 14 ..		40.70 00.15	46.95 55.90	26.659 26.413	161 20 9.08 198 28 9.72	+ 0.33 + 9.47	- 0.12 + 0.12	- 18.66 + 18.66	+20 20 57.92
4	46 Leonis Minoris	W E		10 47 ..		40.50 59.75	47.10 55.85	27.001 29.072	175 44 9.78 184 2 10.82	- 0.31 + 9.27	- 0.23 + 0.23	- 4.05 + 4.05	+34 45 25.00
5	α Cygni	W E		20 38 ..		49.90 59.15	47.70 55.75	29.066 29.892	185 52 8.90 173 52 12.10	- 0.56 + 7.99	- 0.34 + 0.34	+ 5.95 - 5.95	+44 54 50.64
6	April 26, H. α Cygni	W E		20 38 ..		49.95 03.00	51.10 62.45	29.154 29.902	185 52 7.90 173 52 10.18	- 0.32 + 11.17	- 0.34 + 0.34	+ 5.95 - 5.95	+44 55 0.03
7	April 28, H. μ Leonis	W E		9 47 ..		49.20 47.00	51.85 49.90	29.107 29.780	167 26 14.55 192 18 14.80	+ 1.57 - 0.37	- 0.17 + 0.17	- 12.46 + 12.45	+26 28 50.86
8	α Leonis	W E		10 3 ..		40.25 40.90	51.85 50.05	27.585 28.593	153 26 10.70 206 20 12.35	+ 1.60 - 0.35	- 0.07 + 0.07	- 28.11 + 28.11	+12 27 27.96
9	γ Leonis (1st star)	W E		10 14 ..		40.10 47.05	51.80 50.15	26.586 26.538	161 20 13.30 198 28 12.88	+ 1.51 - 0.23	- 0.12 + 0.12	- 19.01 + 19.01	+20 20 59.50
10	41 Leonis Minoris	W E		10 37 ..		48.95 48.25	51.75 50.40	29.288 29.781	164 40 10.80 195 4 12.28	+ 1.41 + 0.44	- 0.15 + 0.15	- 15.40 + 15.40	+23 42 50.71
11	6 H ¹ . Draconis	W E		10 51 ..		48.65 47.25	51.75 50.45	30.575 31.424	219 14 11.98 140 28 13.28	+ 1.71 + 0.45	- 0.26 + 0.26	+ 46.49 - 46.49	+78 18 45.45
12	ρ^4 Leonis	W E		11 2 ..		48.15 46.60	51.75 49.75	28.549 30.470	143 28 11.05 216 16 14.08	+ 1.05 - 0.63	- 0.02 + 0.02	- 41.79 + 41.79	+ 2 29 54.85
13	ν Ursæ Majoris	W E		11 13 ..		49.15 46.60	52.00 49.90	28.543 30.400	174 36 14.28 185 8 12.98	+ 1.03 - 0.56	- 0.22 + 0.22	- 5.24 + 5.24	+33 38 34.95
14	April 29, H. α Cygni	W E		20 38 ..		49.00 47.90	51.85 51.25	29.154 30.316	185 52 5.15 173 52 2.88	+ 0.19 - 0.61	- 0.34 + 0.34	+ 6.00 - 6.00	+44 55 0.05
15	April 30, H. α Cygni	W E		20 38 ..		51.05 45.50	54.90 49.05	29.053 30.327	185 52 4.45 173 52 4.88	+ 4.09 - 0.66	- 0.34 + 0.34	+ 5.98 - 5.98	+44 54 58.81
16	May 4, H. α Leonis	W E		10 3 ..		48.70 45.65	52.40 49.90	27.674 28.729	153 26 4.15 206 20 7.28	+ 2.36 - 0.25	- 0.07 + 0.07	- 28.15 + 28.15	+12 27 26.56
17	γ Leonis (1st star)	W E		10 14 ..		49.45 45.00	52.65 49.80	26.744 26.703	161 20 6.58 198 28 5.90	+ 2.83 - 0.33	- 0.12 + 0.12	- 19.04 + 19.04	+20 21 0.18
18	9 H. Draconis	W E		10 27 ..		48.90 46.00	52.35 50.65	29.711 29.668	217 10 7.18 142 34 3.38	+ 2.87 - 0.71	- 0.22 + 0.22	- 43.18 + 43.18	+76 14 3.40

Time	Ther 1884	Att. ther	Barom.	Observation made at IX with movable thread, except as noted below							No.	Zenith point.	Red. to 1890.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m</i>									<i>° ' "</i>	<i>"</i>
21 29 25	52.0	51.0	29.945	11. Observation at VII.							1	179 55	15.72
24 9 3	51.1	50.5	29.979	18. Observation assumed as at VII.							2	180 26	18.26
25 1 1	50.3	50.5	29.976								3	17 04	17.04
25 4 2	50.4	50.4	29.981								4	19 08	19.08
24 7	50.5	50.5	29.981								5	10.93	10.93
26 21	50.7	50.7	29.981								6	19 47	19.47
26 26 59	50.7	50.7	29.981								7	16 40	16.40
26 5 13	50.8	50.8	29.982								8	18 29	18.29
26 1	50.6	50.6	29.982								9	12 41	12.41
26 14	50.5	50.5	29.982								10	12 41	12.41
26 22	50.2	50.2	29.982								11	18 21	18.21
27 1	50.1	50.1	29.982								12	16 42	16.42
27 1	50.1	50.1	29.982								13	16 42	16.42
27 1	50.1	50.1	29.982								14	16 42	16.42
27 1	50.1	50.1	29.982								15	16 42	16.42
27 1	50.1	50.1	29.982								16	16 42	16.42
27 1	50.1	50.1	29.982								17	16 42	16.42
27 1	50.1	50.1	29.982								18	16 42	16.42

Notes.
 (14) Poor clouds.
 (18) One level reading decreased 5 div

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	46 Leonis Minoris	W E	...	10 48	...	48. 85 45. 95	52. 20 50. 20	27. 001 29. 339	175 44 8. 38 184 2 7. 78	+ 2. 33 + 0. 03	- 0. 23 + 0. 23	- 4. 14 + 4. 14	+34 45 25. 91
2	α Ursæ Majoris	W E	...	10 58	...	49. 50 46. 75	52. 55 50. 60	29. 810 29. 592	203 14 3. 02 156 30 4. 58	+ 2. 80 + 0. 59	- 0. 64 + 0. 64	+ 24. 59 - 24. 59	+62 17 45. 70
3	δ Leonis	W E	...	11 9	...	49. 60 45. 95	52. 55 50. 20	28. 858 30. 344	162 2 7. 30 197 42 10. 75	+ 2. 85 + 0. 03	- 0. 13 + 0. 13	- 18. 33 + 18. 33	+21 4 27. 46
4	ν Leonis	W E	...	11 32	...	48. 95 45. 40	52. 20 49. 35	28. 499 30. 779	140 42 5. 08 219 2 9. 45	+ 2. 37 - 0. 63	0. 00 0. 00	- 46. 45 + 46. 45	- 0 16 16. 66
5	α Ursæ Minoris S. P. May 9, H.	E W	...	13 10 54. 0 13 29 14. 0	11 4. 6 7 15. 4	45. 40 50. 35	49. 40 53. 70	..... .....	127 38 9. 74 232 12 31. 84	- 0. 17 + 4. 19	- 5. 17 + 2. 21	- 14. 10 + 14. 11	+88 46 12. 40
6	ν Ursæ Majoris	W E	...	11 13	...	49. 95 50. 70	47. 00 48. 05	28. 751 30. 469	174 36 7. 70 185 8 9. 00	- 0. 66 + 0. 19	- 0. 22 + 0. 22	- 5. 15 + 5. 15	+33 38 35. 07
7	τ Leonis	W E	...	11 23	...	50. 45 50. 40	47. 10 47. 45	29. 459 29. 798	144 22 6. 90 215 22 10. 25	- 0. 38 - 0. 24	- 0. 02 + 0. 02	- 39. 74 + 39. 73	+ 3 24 28. 17
8	ν Leonis	W E	...	11 32	...	50. 60 50. 45	47. 95 47. 90	28. 468 30. 710	140 42 9. 15 219 2 11. 10	+ 0. 09 + 0. 01	0. 00 0. 00	- 45. 45 + 45. 45	- 0 16 15. 57
9	β Leonis	W E	...	11 44	...	50. 40 50. 35	47. 60 47. 70	28. 319 30. 888	156 6 8. 35 203 38 9. 40	- 0. 17 - 0. 14	- 0. 08 + 0. 08	- 24. 60 + 24. 60	+15 7 58. 92
10	η Virginis	W E	...	12 15	...	50. 05 50. 25	47. 55 47. 60	30. 941 31. 329	140 50 6. 10 218 52 8. 90	- 0. 35 - 0. 23	0. 00 0. 00	- 45. 33 + 45. 32	- 0 6 38. 13
11	α Ursæ Minoris S. P.	W E	...	13 14 13. 0 13 26 34. 0	7 49. 6 4 31. 4	50. 85 50. 25	47. 50 47. 45	..... .....	232 12 37. 35 127 37 59. 56	+ 1. 01 + 0. 71	+ 2. 58 - 0. 87	+ 12. 58 - 12. 58	+88 46 10. 06
12	α Cygni	W E	...	20 38	...	49. 00 51. 50	46. 50 48. 75	29. 185 30. 159	185 52 6. 52 173 52 8. 12	- 0. 42 + 1. 82	- 0. 34 + 0. 34	+ 6. 02 - 6. 02	+44 55 0. 48
13	α Ursæ Minoris May 11, H.	W E	...	1 14 36. 0 1 32 42. 0	7 27. 5 10 38. 5	49. 50 49. 10	46. 45 46. 00	..... .....	229 45 9. 91 130 5 32. 28	+ 0. 23 - 0. 17	- 2. 35 + 4. 77	+ 5. 84 - 5. 84	+88 46 7. 90
14	τ Leonis	W E	...	11 23	...	49. 05 51. 55	47. 65 50. 40	26. 568 26. 945	144 24 7. 32 215 24 9. 05	- 0. 55 + 1. 93	- 0. 02 + 0. 02	- 39. 61 + 39. 62	+ 3 24 27. 17
15	χ Ursæ Majoris	W E	...	11 41	...	48. 80 51. 70	47. 90 50. 55	30. 975 31. 239	189 16 8. 55 170 26 10. 48	- 0. 54 + 2. 07	- 0. 37 + 0. 37	+ 9. 23 - 9. 23	+48 20 17. 80
16	γ Ursæ Majoris	W E	...	11 49	...	49. 60 52. 40	48. 15 50. 70	29. 444 29. 885	195 12 9. 30 164 32 8. 18	- 0. 05 + 2. 47	- 0. 47 + 0. 47	+ 15. 27 - 15. 27	+54 15 21. 70
17	σ Virginis	W E	...	12 0	...	49. 90 51. 40	48. 70 50. 10	27. 683 28. 664	150 16 8. 85 209 30 10. 90	+ 0. 35 + 1. 72	- 0. 05 + 0. 05	- 31. 65 + 31. 65	+ 9 17 23. 16
18	η Virginis	W E	...	12 15	...	49. 95 51. 50	48. 60 50. 15	30. 878 31. 300	140 50 8. 50 218 52 8. 10	+ 0. 33 + 1. 79	0. 00 0. 00	- 45. 18 + 45. 18	- 0 6 37. 73
19	δ Corvi	W E	...	12 22 20. 0 12 28 7. 0	2 53. 2 2 53. 8	50. 00 51. 90	48. 85 50. 40	..... .....	125 3 36. 20 234 47 4. 56	+ 1. 20 + 2. 82	+ 14. 96 - 15. 07	- 1 19. 10 + 1 19. 12	- 15 57 32. 48

Time	Ther. 382.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
4 10 38	59.9	62.0	29.941	5. 13. Observation assumed as at VII with fixed thread.	1	179 55 18.72	+7.17
10 48	59.1	...	...	11. Observation assumed as at III with fixed thread.	2	17.92	...
11 9	59.0	...	...	19. Observation at V with fixed thread.	3	18.36	...
11 42	58.4	60.0	29.956		4	18.02	...
11 20	55.1	...	...		5	21.32	...
11 40	56.0	...	29.949		6	16.36	...
9 10 57	67.0	69.0	29.776		7	17.26	...
11 23	66.9	...	...		8	17.56	...
11 32	66.2	...	...		9	16.21	...
11 44	66.0	...	...		10	17.74	...
11 54	64.8	66.5	29.785		11	20.17	...
13 20	62.9	...	...		12	18.82	...
13 28	...	63.7	29.796	Notes.	13	22.34	...
20 27	71.9	50.0	29.886	1. Unsteady.	14	20.61	...
1 24	71.0	...	...	1 E. One level reading decreased 1 div.	15	19.68	...
1 42	...	68.5	29.981	6 W. One level reading decreased 2 div.	16	20.43	...
11 11 3	...	69.5	29.749	10. Clouds.	17	20.50	...
11 41	66.9	...	...	13. Faint.	18	18.02	...
11 49	66.9	...	...	18 E. One microscope reading decreased 10".	19	22.34	...
12 0	66.9	...	...		
12 8	66.9	67.0	29.748				
12 25	65.8	...	...		
12 48	...	65.0	29.764				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S.P.	E		13 11 20.0	10 45.1	51.65	49.95		127 38 5.91	+ 2.21	- 4.87	-1 12.34	+88 46 10.22
		W		13 29 42.0	7 36.9	50.40	49.40		232 12 41.10	+ 1.37	+ 2.45	+1 12.30	
2	α Cygni	W		20 38		50.20	48.90	29.180	185 52 8.12	- 0.02	- 0.34	+ 5.97	+44 55 0.71
		E				51.95	50.10	30.119	173 52 11.45	+ 1.36	+ 0.34	- 5.97	
3	α Ursæ Minoris	E		1 17 30.0	4 35.6	49.80	48.75		130 5 35.30	+ 0.75	+ 0.89	-1 4.67	+88 46 8.22
	May 13, H.	W		1 30 4.0	7 58.4	49.50	48.40		229 45 13.06	+ 0.43	- 2.67	+1 4.68	
4	α Cygni	W		20 38		51.15	50.45	29.152	185 52 7.75	- 0.60	- 0.34	+ 6.03	+44 55 0.26
	May 14, H.	E				54.70	53.70	29.979	173 52 14.85	+ 2.55	+ 0.34	- 6.04	
5	ι Leonis	W		10 44		52.85	51.05	29.205	152 2 11.35	+ 0.73	- 0.00	- 29.48	+11 4 33.58
		E				51.95	51.05	29.887	207 42 11.18	+ 0.03	+ 0.00	- 29.48	
6	α Ursæ Majoris	W		10 58		52.55	51.25	29.657	203 14 11.55	+ 0.40	- 0.64	+ 24.18	+62 17 46.42
		E				52.40	51.35	29.350	150 30 11.55	+ 0.38	+ 0.64	- 24.19	
7	γ Draconis	W		11 26		51.95	51.05	28.770	210 50 13.52	+ 0.31	- 0.91	+ 33.64	+69 53 20.28
		E				52.05	51.55	27.382	148 56 8.30	+ 0.31	+ 0.91	- 33.64	
8	β Leonis	W		11 44		52.50	51.90	28.278	156 6 8.25	+ 0.60	- 0.08	- 24.76	-15 7 58.98
		E				51.20	50.70	30.893	203 38 8.22	- 0.49	+ 0.08	+ 24.76	
9	π Virginis	W		11 50		53.30	52.25	29.152	148 8 6.95	+ 1.23	- 0.04	- 34.76	+ 7 10 22.56
		E				54.55	50.60	30.123	211 36 7.40	- 0.38	+ 0.04	+ 34.76	
10	γ H. Draconis	W		12 8		53.10	52.05	27.592	219 8 5.38	+ 1.48	- 0.26	+ 45.95	+78 10 39.24
		E				51.85	51.30	28.716	140 38 6.50	+ 0.54	+ 0.26	- 45.95	
11	δ Corvi	W		12 21 40.0	2 54.0	53.45	52.20		125 3 34.85	- 2.00	+15.10	-1 19.87	-15 57 31.12
		E		12 27 27.0	2 53.0	51.40	50.70		234 47 2.25	+ 0.33	-14.93	+1 19.87	
12	α Ursæ Minoris S.P.	W		13 9 10.0	12 17.7	54.30	52.80		232 12 31.49	+ 2.97	+ 0.37	+1 13.00	+88 46 9.20
	May 15, H.	E		13 21 8.0	0 19.7	51.45	50.20		127 37 58.02	+ 0.41	0.00	-1 13.00	
13	ι Leonis	W		10 44		51.60	50.55	29.186	152 2 12.62	+ 0.85	- 0.06	- 29.44	+11 4 33.61
		E				50.70	50.15	29.914	207 42 10.52	+ 0.24	+ 0.06	- 29.44	
14	ϕ Ursæ Majoris	E		11 4		51.40	50.85	30.450	173 44 11.72	+ 2.37	+ 0.34	- 6.00	+45 2 44.05
		W				53.25	52.05	31.473	185 58 11.78	+ 4.09	- 0.34	+ 6.00	
15	ϵ Ursæ Majoris	W		11 13		52.85	51.55	28.603	174 36 11.52	+ 1.91	- 0.22	- 5.17	+33 38 36.23
		E				50.85	49.95	25.011	185 18 13.55	+ 0.21	+ 0.22	+ 5.17	
16	λ Draconis	E		11 26		51.05	50.90	30.302	148 54 10.98	+ 2.50	+ 0.91	- 33.61	+69 53 17.92
		W				53.80	52.75	28.741	210 50 10.08	+ 4.38	- 0.91	+ 33.61	
17	χ Ursæ Majoris	W		11 41		53.10	51.80	30.788	189 16 10.72	+ 2.15	- 0.37	+ 9.30	+48 20 17.47
		E				51.05	50.45	31.231	170 26 10.35	+ 0.55	+ 0.37	- 9.30	
18	π Virginis	E		11 50		50.90	49.90	30.037	211 36 9.75	+ 1.67	+ 0.04	- 34.75	+ 7 10 22.61
		W				54.60	53.30	29.011	148 8 9.88	+ 5.01	0.04	- 34.75	

Time	Ther- m.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below				No.	Zenith point	Red. to 1899.0.
11 20 21	64.5		29.968	1	Observation assumed as at VII with fixed thread.			1	129 55 24.10	.....
11 25 21	64.5		29.968	3.12	Observation assumed as at III with fixed thread			2	26.31	.....
11 26 21	64.5		29.968	10.	Observation at VII.			3	26.38	.....
11 27 21	64.5		29.968	11.	Observation at V with fixed thread			4	18.68	.....
11 28 21	64.5		29.968	12.	Observation on Z. D. thread D.			5	17.48	.....
11 29 21	64.5		29.968	13.16.18.	Observation at I.			6	17.84	.....
11 30 21	64.5		29.968					7	16.84	.....
11 31 21	64.5		29.968					8	16.60	.....
11 32 21	64.5		29.968					9	16.98	.....
11 33 21	64.5		29.968					10	15.74	.....
11 34 21	64.5		29.968					11	19.80	.....
11 35 21	64.5		29.968					12	19.61	.....
11 36 21	64.5		29.968					13	17.93	.....
11 37 21	64.5		29.968					14	18.42	.....
11 38 21	64.5		29.968					15	16.64	.....
11 39 21	64.5		29.968					16	18.61	.....
11 40 21	64.5		29.968					17	17.39	.....
11 41 21	64.5		29.968					18	17.89	.....
11 42 21	64.5		29.968							.....
11 43 21	64.5		29.968							.....
11 44 21	64.5		29.968							.....
11 45 21	64.5		29.968							.....
11 46 21	64.5		29.968							.....
11 47 21	64.5		29.968							.....
11 48 21	64.5		29.968							.....
11 49 21	64.5		29.968							.....
11 50 21	64.5		29.968							.....
11 51 21	64.5		29.968							.....
11 52 21	64.5		29.968							.....
11 53 21	64.5		29.968							.....
11 54 21	64.5		29.968							.....
11 55 21	64.5		29.968							.....
11 56 21	64.5		29.968							.....
11 57 21	64.5		29.968							.....
11 58 21	64.5		29.968							.....
11 59 21	64.5		29.968							.....
12 00 21	64.5		29.968							.....

Notes.

1. Faint clouds.
 6 W. Micrometer reading decreased 1 rev.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Corvi	W E	...	12 1 40.0 12 8 5.0	3 11.8 3 13.2	54.00 51.15	53.00 50.40	..... .....	118 57 30.84 240 53 3.02	+ 3.86 + 1.30	+16.54 -16.79	-1 40.94 +1 40.94	-22 3 52.47
2	α Ursæ Minoris S. P.	E W	...	13 6 54.0 13 24 40.0	14 34.7 3 11.3	49.90 56.00	49.00 53.95	..... .....	127 38 11.60 232 12 38.29	- 0.24 + 4.96	- 8.96 + 0.43	-1 13.10 +1 13.10	+88 46 9.65
3	α Cygni	E W	...	20 38 ..... .....	..... .....	50.35 55.35	49.35 53.85	30.113 29.003	173 52 9.20 185 52 9.18	+ 0.85 + 5.33	+ 0.34 - 0.34	- 6.01 + 6.01	+44 55 1.85
4	May 20, H. τ Leonis	W E	...	11 23 ..... .....	..... .....	46.45 48.95	48.05 50.85	29.462 29.771	144 22 8.58 215 22 8.78	- 0.71 + 1.79	- 0.02 + 0.02	- 40.23 + 40.22	+ 3 24 28.72
5	ν Leonis	E W	...	11 32 ..... .....	..... .....	49.60 47.50	51.10 49.00	30.651 28.426	219 2 9.80 140 42 11.92	+ 3.67 + 1.69	0.00 0.00	+ 45.96 - 45.96	- 0 16 14.69
6	γ Ursæ Majoris	W E	...	11 49 ..... .....	..... .....	46.60 50.10	48.40 51.50	29.385 29.805	195 12 8.78 164 32 11.38	- 0.47 + 2.64	- 0.47 + 0.47	+ 15.51 - 15.51	+54 15 20.24
7	ϵ Corvi	W E	...	12 1 52.0 12 8 18.0	3 3.2 3 22.8	48.25 49.55	49.55 50.95	..... .....	118 57 34.49 240 53 1.61	+ 1.58 + 2.85	+15.09 -18.49	-1 41.70 +1 41.71	-22 3 52.49
8	8 Canum Venat.	E W	...	12 29 ..... .....	..... .....	49.55 47.50	50.95 49.10	28.062 28.038	176 54 11.35 182 52 10.78	+ 3.58 + 1.75	+ 0.30 - 0.30	- 2.96 + 2.96	+41 54 17.58
9	α Ursæ Minoris S. P.	W E	...	13 9 26.0 13 21 34.0	12 9.3 0 1.3	48.50 49.45	49.40 50.05	..... .....	232 12 35.50 127 37 58.88	+ 1.91 + 2.66	+ 6.23 0.00	+1 13.48 -1 13.50	+88 46 8.84
10	η Boötis	W E	...	13 50 ..... .....	..... .....	47.95 49.10	50.10 50.80	28.187 30.855	159 52 11.58 199 52 10.65	+ 0.97 + 1.84	- 0.11 + 0.11	- 20.78 + 20.78	+18 54 1.30
11	May 21, H. α Ursæ Minoris S. P.	E W	...	13 14 50.0 13 28 10.0	6 46.5 6 33.5	48.35 48.60	50.10 50.30	..... .....	127 38 0.08 232 12 41.02	- 0.29 - 0.08	- 1.94 + 1.81	-1 13.52 +1 13.52	+88 46 7.41
12	May 23, H. α Ursæ Minoris	W E	...	1 14 59.0 1 28 22.0	6 42.6 6 40.4	46.25 48.50	47.75 50.00	..... .....	229 45 5.98 130 5 38.14	- 0.29 + 1.83	- 1.89 + 1.87	+1 6.60 -1 6.60	+88 46 4.20
13	May 24, H. 2 Canum Venat.	E W	...	12 11 ..... .....	..... .....	49.50 45.60	51.55 47.95	29.519 29.526	177 34 11.62 182 10 9.85	+ 5.21 + 1.67	+ 0.29 - 0.29	- 2.27 + 2.27	+41 13 16.10
14	8 Canum Venat.	W E	...	12 29 ..... .....	..... .....	46.50 50.60	48.45 51.90	28.069 28.062	182 52 9.38 176 54 12.15	+ 0.87 + 4.43	- 0.30 + 0.30	+ 2.95 - 2.95	+41 54 16.26
15	α Ursæ Minoris S. P.	W E	...	13 13 21.0 13 30 34.0	8 19.9 8 53.1	47.15 48.55	49.30 50.20	..... .....	232 12 40.36 127 37 59.50	+ 2.60 + 3.68	+ 2.93 - 3.33	+1 13.54 -1 13.55	+88 46 6.81
16	Groombridge 2109	E W	...	14 21 ..... .....	..... .....	48.65 47.35	50.15 49.45	33.150 28.916	179 54 9.85 179 48 7.12	+ 4.15 + 3.21	+ 0.27 - 0.27	+ 0.07 - 0.07	+38 50 48.01

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
15 12 5	65.4	.....	.....	1, 7. Observation at V with fixed thread.	1	179 55 19.38	
12 12	.....	66.0	29.969	2, 11, 12. Observation assumed as at VII with fixed thread.	2	23.04	
13 16	62.1	.....	.....	3, 5, 8, 13, 16. Observation at I.	3	18.40	
13 27	.....	63.2	29.961	9, 15. Observation assumed as at III with fixed thread.	4	17.74	
20 45	56.1	57.0	29.929		5	18.88	
20 11 11	61.1	62.5	29.795		6	18.81	
11 32	60.9	.....	.....		7	18.57	
11 49	59.9	.....	.....		8	18.27	+6.15
12 5	58.9	60.0	29.798		9	22.58	
12 29	57.9	.....	.....		10	17.14	
12 53	.....	58.0	29.807		11	20.30	
13 15	56.9	.....	.....		12	22.84	
13 59	56.0	56.0	29.816		13	18.86	+5.25
21 13 22	58.1	.....	.....		14	18.60	+5.47
13 37	.....	56.6	29.886		15	22.86	
23 1 22	67.8	.....	.....		16	18.52	+8.07
1 37	.....	64.5	30.125				
24 11 49	64.1	66.0	30.074	Note.			
12 11	.....	.....	.....	16. Poor; faint.			
12 29	64.1	.....	.....		
12 58	.....	62.0	30.086				
13 22	61.2	.....	.....		
13 53	60.8	60.5	30.089				
14 21	59.6	.....	.....		

No	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	33 Boötis	W		14 35		48. 15	50. 25	28. 013	185 48 9. 22	+ 2. 51	+ 0. 34	- 5. 94	+44 50 18. 06
		E				49. 65	50. 85	28. 164	173 58 10. 42	+ 3. 48	+ 0. 34	- 5. 94	
2	Piazzi 235	E		14 53		48. 25	49. 95	31. 150	168 44 9. 00	+ 3. 87	+ 0. 40	- 11. 25	+50 2 23. 52
		W				47. 65	49. 85	27. 977	191 0 10. 98	+ 3. 53	- 0. 40	+ 11. 25	
3	α Cygni	W		20 38		47. 10	49. 30	29. 430	185 51 58. 10	- 0. 41	- 0. 34	+ 6. 12	+44 55 3. 41
		E				49. 70	50. 60	30. 039	173 52 9. 45	+ 1. 41	+ 0. 34	- 6. 12	
4	α Ursæ Minoris	E		1 13 10. 0	8 36. 2	48. 15	50. 15		130 5 36. 48	+ 2. 65	+ 3. 12	- 1 6. 57	+88 46 3. 89
	May 25, H.	W		1 30 35. 0	8 42. 8	46. 00	47. 55		229 45 6. 40	+ 0. 41	- 3. 20	+ 1 6. 59	
5	σ Virginis	W		12 0		46. 30	47. 85	27. 680	150 16 10. 05	+ 0. 05	- 0. 05	- 32. 22	+ 9 17 24. 41
		E				49. 45	51. 05	28. 571	209 30 10. 58	+ 3. 04	+ 0. 05	+ 32. 22	
6	γ Corvi	W		12 7 50. 0	2 59. 5	45. 40	47. 55		124 2 2. 22	+ 0. 22	+ 15. 79	- 1 23. 71	- 16 59 11. 98
		E		12 13 50. 0	3 0. 5	50. 00	50. 95		235 48 40. 01	+ 3. 98	- 15. 96	+ 1 23. 71	
7	β Corvi	W		12 26 0. 0	3 17. 9	46. 25	48. 20		118 10 52. 10	+ 0. 92	+ 17. 39	- 1 45. 30	- 22 50 41. 00
		E		12 32 37. 0	3 19. 1	49. 10	51. 20		241 39 48. 98	+ 3. 68	- 17. 60	+ 1 45. 31	
8	α Ursæ Minoris S. P.	E		13 15 15. 0	6 38. 2	48. 90	50. 65		127 38 1. 22	- 3. 03	- 1. 85	- 1 13. 00	+88 46 8. 07
	May 26, H.	W		13 28 52. 0	6 58. 8	47. 95	49. 65		232 12 41. 50	+ 2. 11	+ 2. 06	+ 1 13. 00	
9	α Ursæ Minoris S. P.	W		13 13 26. 0	8 29. 3	47. 05	49. 25		232 12 41. 24	+ 0. 43	+ 3. 04	+ 1 13. 03	+88 46 6. 49
	May 28, H.	E		13 30 45. 0	8 49. 7	48. 65	50. 20		127 37 58. 65	- 1. 03	- 3. 28	- 1 13. 03	
10	β Leonis	W		11 44		48. 10	50. 05	28. 295	156 6 12. 50	- 0. 03	- 0. 08	- 23. 75	+ 15 8 0. 55
		E				50. 75	53. 15	30. 770	203 38 12. 95	+ 2. 69	+ 0. 08	- 23. 75	
11	α Ursæ Minoris S. P.	E		13 17 13. 0	4 50. 4	47. 35	49. 45		127 37 55. 88	- 0. 22	- 1. 00	- 1 10. 26	+88 46 5. 87
		W		13 28 40. 0	6 42. 6	48. 70	50. 25		232 12 46. 44	+ 0. 79	+ 1. 90	+ 1 10. 28	
12	α Ursæ Minoris	W		1 15 25. 0	6 39. 0	46. 35	47. 20		229 45 8. 95	- 0. 13	- 1. 86	+ 1 4. 19	+88 46 4. 39
	May 30, H.	E		1 28 46. 0	6 42. 0	46. 90	48. 50		130 5 37. 18	+ 0. 75	+ 1. 89	- 1 4. 18	
13	α Ursæ Minoris S. P.	W		13 13 42. 0	8 25. 1	48. 55	50. 45		232 12 41. 26	+ 1. 50	+ 2. 99	+ 1 10. 76	+88 46 7. 46
	June 2, H.	E		13 30 55. 0	8 47. 9	47. 25	49. 05		127 37 58. 52	+ 0. 31	- 3. 26	- 1 10. 76	
14	κ Draconis	W		12 29		46. 05	48. 45	27. 989	211 18 8. 78	- 0. 37	- 0. 93	+ 33. 36	+70 20 42. 32
		E				49. 50	51. 00	28. 220	148 28 10. 00	+ 2. 45	+ 0. 93	- 33. 36	
15	α Ursæ Minoris S. P.	E		13 15 44. 0	6 31. 5	48. 25	49. 90		127 37 56. 18	+ 1. 79	- 1. 79	- 1 10. 74	+88 46 5. 62
		W		13 29 5. 0	6 49. 5	48. 15	49. 60		232 12 46. 59	+ 1. 59	+ 1. 97	+ 1 10. 76	
16	γ Ursæ Majoris	W		13 44		48. 85	49. 85	28. 909	190 46 9. 88	+ 1. 59	- 0. 40	+ 10. 58	+49 48 59. 62
		E				48. 50	49. 80	30. 209	168 58 11. 35	+ 1. 41	+ 0. 40	- 10. 58	

Time	Ther- m	Alt- ther	Barom	Observation made at IX with movable thread, except as noted below	No	Zenith point	Red. to 1899.0.
<i>h m</i>			<i>in</i>				
21 14.65	68.4			2. Observation at I.	1	179 55 18.93	+7.25
22 15.2	68.6		30.085	4.7. 11. Observation assumed as at III with fixed thread	2	20.03	+6.80
23 20.26	69.1		30.061	6.7. Observation at V with fixed thread	3	17.69	
24 1.5	69.0		30.146	8, 11, 12, 15. Observation assumed as at VII with fixed thread.	4	22.93	
25 1.22	68.4				5	19.50	
26 11.44	61.1	66.0	30.957		6	23.11	
27 12.11	61.9				7	22.74	
28 12.29	61.8				8	24.64	
29 12.58	62.0		30.059		9	20.86	
30 13.27	66.0				10	19.28	
31 13.57	69.7		30.666		11	21.90	
32 14.28	62.0		29.905		12	23.40	
33 15.16	84.0		29.828		13	20.70	
34 15.23	79.8				14	17.20	
35 15.38		75.5	29.929		15	23.18	
36 1.22	81.0				16	18.28	
37 1.57		79.0	29.925				
38 11.12	77.5		29.875				
39 11.42	77.0		29.875				
40 12.13	76.0		29.826				
41 12.55	78.1		29.866				
42 1.2	76.7						
43 1.5	76.1		29.864				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris	W	...	1 15 31.0	6 45.0	46.00	45.00	...	229 45 6.31	- 0.22	- 1.92	+1 5.48	+88 46 3.84
	June 3, H.	E	...	1 28 50.0	6 34.0	47.50	46.20	...	130 5 37.85	+ 1.05	+ 1.82	-1 5.48	
2	α Ursæ Minoris S. P.	W	...	13 13 45.0	8 33.4	48.85	46.95	...	232 12 42.48	+ 2.26	+ 3.09	+1 11.45	+88 46 5.98
		E	...	13 31 8.0	8 49.6	46.95	45.50	...	127 37 58.58	+ 0.69	- 3.29	-1 11.47	
3	η Boötis	E	...	13 50		47.50	46.20	30.981	199 52 9.42	+ 1.72	+ 0.11	+ 20.17	+18 54 2.79
		W	...			49.90	48.35	28.269	159 52 10.88	+ 3.86	- 0.11	- 20.17	
4	α Boötis	W	...	14 11		49.45	47.90	28.822	160 40 2.45	+ 1.98	- 0.12	- 19.28	+19 42 18.74
		E	...			46.80	46.20	30.771	199 4 1.90	- 0.07	+ 0.12	+ 19.28	
5	θ Boötis	E	...	14 22		47.25	46.20	30.439	166 28 3.38	+ 1.61	+ 0.43	- 13.21	+52 19 0.17
		W	...			49.50	47.75	28.808	193 16 9.72	+ 3.39	- 0.43	+ 13.21	
6	33 Boötis	W	...	14 35		49.50	48.05	28.201	185 48 3.80	+ 2.07	- 0.34	+ 5.75	+44 50 20.72
		E	...			46.85	46.15	28.265	173 58 6.00	- 0.07	+ 0.34	- 5.75	
7	α Cygni	W	...	20 38		47.55	46.86	29.274	185 52 6.00	+ 0.57	- 0.34	+ 5.91	+44 55 4.87
	June 4, H.	E	...			48.10	47.25	30.100	173 52 6.50	+ 1.04	+ 0.34	- 5.91	
8	α Ursæ Minoris S. P.	E	...	13 15 47.0	6 33.4	46.80	46.30	...	127 37 57.52	- 0.10	- 1.81	-1 10.80	+88 46 5.44
	June 5, H.	W	...	13 29 5.0	6 44.6	49.60	48.25	...	232 12 45.81	+ 2.13	+ 1.91	+1 10.80	
9	α Cygni	W	...	20 38		49.85	48.00	29.477	185 51 57.42	+ 0.51	- 0.34	+ 5.81	+44 55 6.15
	June 7, H.	E	...			48.45	46.85	30.221	173 52 0.18	- 0.68	+ 0.34	- 5.81	
10	α Cygni	E	...	20 38		48.10	46.55	30.049	173 52 7.45	+ 0.73	+ 0.34	- 5.75	+44 55 6.43
	June 8, H.	W	...			49.50	47.95	29.269	185 52 6.70	+ 2.05	- 0.34	+ 5.75	
11	8 Canum Venat.	W	...	12 29		47.75	46.90	31.120	182 50 9.10	+ 1.37	- 0.30	+ 2.79	+41 54 18.76
		E	...			46.80	45.80	28.218	176 54 9.32	+ 0.41	+ 0.30	- 2.79	
12	Groombridge 1922	E	...	12 40		47.25	46.50	26.514	172 50 8.22	+ 2.41	+ 0.35	- 6.65	+45 59 29.63
		W	...			50.15	48.25	26.769	186 58 9.00	+ 4.59	- 0.35	+ 6.65	
13	14 Canum Venat.	W	...	13 1		49.50	47.95	31.345	177 15 59.45	+ 2.69	- 0.24	- 2.42	+36 20 15.67
		E	...			46.10	45.45	28.444	182 27 57.35	- 0.09	+ 0.24	+ 2.42	
14	α Ursæ Minoris S. P.	W	...	13 13 44.0	8 45.5	50.80	48.60	...	232 12 44.89	+ 4.61	+ 3.24	+1 9.49	+88 46 4.73
	June 14, H.	E	...	13 31 20.0	8 50.5	45.70	44.85	...	127 37 57.32	+ 0.46	- 3.29	-1 9.49	
15	α Ursæ Minoris S. P.	E	...	13 16 20.0	6 23.9	49.90	48.05	...	127 37 54.34	+ 1.33	- 1.73	-1 9.65	+88 46 4.69
		W	...	13 29 26.0	6 42.1	48.90	47.90	...	232 12 49.25	+ 0.80	+ 1.89	+1 9.65	
16	τ Boötis	W	...	13 43		48.05	46.45	30.468	158 54 7.80	- 0.73	- 0.11	- 20.71	+17 57 28.11
		E	...			49.55	48.15	28.850	200 50 7.82	+ 0.79	+ 0.11	+ 20.71	
17	4 Ursæ Minoris	E	...	14 9		50.65	49.15	30.499	140 46 8.95	+ 2.79	+ 0.26	- 44.00	+78 1 21.74
		W	...			49.35	47.25	28.683	218 58 7.32	+ 1.27	- 0.26	+ 44.00	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.					No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
2 1 14		72.0	30.038	1, 8, 15	Observation assumed as at VII with fixed thread.					1	179 55 22.44
1 22	74.7			2, 14.	Observation assumed as at III with fixed thread.					2	21.90
3 12 56		74.6	29.926	3, 5, 10, 12.	Observation at I.					3	21.81
13 22	72.9			17.	Observation assumed as at III.					4	19.00
13 50	72.8									5	17.86
13 59	74.5	72.0	29.936							6	17.92
14 22	71.9									7	18.45
14 35	71.8									8	22.73
14 58		71.0	29.934							9	16.74
20 25	64.9	65.5	29.888							10	18.72
4 16 22	77.9									11	20.77
13 49		77.0	29.946							12	19.14
5 20 25	71.8	74.0	29.868							13	19.68
7 20 20	76.7	77.0	29.801							14	23.62
8 12 15	87.9	90.0	29.787							15	22.94
12 40	86.9									16	18.09
13 1		85.0	29.797	Note.						17	17.64
13 23	84.9			13 E. Micrometer reading increased 4 rev.							
14 11 1		83.0	29.801								
14 21	83.9										
14 43	82.9										
14 4	81.4	80.5	29.796								

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	θ Boötis	W	...	14 22	...	48.50	47.00	29.000	193 16 8.55	- 0.25	- 0.43	+ 12.92	+ 52 10 2.10
		E	...	...	...	50.15	48.65	30.271	166 28 9.05	+ 1.30	+ 0.43	- 12.92	
2	π Boötis	E	...	14 30	...	50.40	48.80	29.576	201 56 7.65	+ 2.95	+ 0.10	+ 22.00	+ 16 50 55.46
		W	...	...	...	50.00	48.10	29.611	157 48 8.45	+ 2.43	- 0.10	- 22.00	
3	295 B. Boötis	W	...	14 45	...	49.25	47.85	30.061	179 10 9.28	+ 0.50	- 0.26	- 0.66	+ 38 13 34.27
		E	...	...	...	49.90	48.30	29.147	180 34 9.02	+ 1.01	+ 0.26	+ 0.66	
4	δ Libræ	E	...	14 56	...	49.85	48.20	29.158	226 54 4.70	+ 2.40	- 0.04	+ 58.28	- 8 7 10.40
		W	...	...	...	50.30	48.25	30.227	132 50 5.20	+ 2.63	+ 0.04	- 58.28	
5	3 Serpentis	W	...	15 10	...	49.70	48.50	32.658	146 14 5.75	+ 1.01	- 0.03	- 36.08	+ 5 18 41.15
		E	...	...	...	49.40	48.10	32.033	213 26 5.88	+ 0.69	+ 0.03	+ 36.08	
6	θ Corone Borealis	E	...	15 20	...	49.90	48.40	28.493	187 6 8.52	+ 2.53	+ 0.21	+ 6.89	+ 31 41 54.10
		W	...	...	...	50.05	48.80	30.649	172 38 9.48	+ 2.79	- 0.21	- 6.89	
7	ϵ Serpentis	W	...	15 37	...	50.45	48.55	30.591	160 56 8.68	+ 1.39	- 0.12	- 18.65	+ 10 59 38.38
		E	...	...	...	49.45	48.00	28.564	198 48 11.22	+ 0.60	+ 0.12	+ 18.65	
8	ζ Ursæ Minoris	E	...	15 48	...	50.65	48.55	29.072	140 42 9.48	+ 2.94	+ 1.59	- 44.30	+ 78 6 20.33
		W	...	...	...	50.60	48.60	30.109	219 2 9.05	+ 2.95	- 1.59	+ 44.30	
9	α Cygni	W	...	20 38	...	49.40	48.00	29.311	185 52 9.58	+ 0.64	- 0.34	+ 5.76	+ 44 55 8.70
		E	...	...	...	49.95	48.50	29.931	173 52 10.52	+ 1.13	+ 0.34	- 5.76	
10	June 15, H. α Ursæ Minoris S. P.	W	...	13 13 54.0	8 51.8	50.15	47.70	...	232 12 45.58	+ 1.51	+ 3.31	+ 1 9.82	+ 88 46 5.54
		E	...	13 31 37.0	8 51.2	48.55	47.30	...	127 37 57.20	+ 0.58	- 3.31	- 1 9.86	
11	June 16, H. α Ursæ Minoris S. P.	E	...	13 16 27.0	6 20.7	47.30	45.65	...	127 38 0.34	- 0.27	- 1.70	- 12.64	+ 88 46 4.04
		W	...	13 29 27.0	6 39.3	50.40	48.80	...	232 12 45.31	+ 2.68	+ 1.87	+ 12.66	
12	i Draconis	W	...	13 48	...	49.00	47.80	29.197	206 10 3.75	+ 1.11	- 0.74	+ 27.87	+ 65 13 19.66
		E	...	...	...	48.50	47.85	30.351	153 34 5.08	+ 0.91	+ 0.74	- 27.87	
13	f Boötis	W	...	14 22	...	50.70	48.50	29.328	160 38 7.20	+ 2.23	- 0.12	- 19.77	+ 19 40 43.36
		E	...	...	...	48.50	47.10	30.039	199 6 6.68	+ 0.55	+ 0.12	+ 19.77	
14	σ Boötis	E	...	14 30	...	49.40	47.80	29.882	188 36 7.62	+ 2.76	+ 0.19	+ 8.71	+ 30 10 56.74
		W	...	...	...	51.25	48.85	29.311	171 8 7.55	+ 4.12	- 0.19	- 8.71	
15	34 Boötis	W	...	14 39	...	50.40	48.35	30.038	167 54 8.05	+ 2.03	- 0.17	- 12.01	+ 26 57 19.28
		E	...	...	...	48.35	47.25	29.335	191 52 8.60	+ 0.55	+ 0.17	+ 12.01	
16	61 B. Draconis	E	...	14 49	...	50.05	47.95	28.670	159 6 9.08	+ 3.13	+ 0.58	- 21.52	+ 50 42 15.07
		W	...	...	...	50.95	48.85	30.494	200 38 8.70	+ 3.98	- 0.58	+ 21.51	
17	α Cygni	E	...	20 38	...	49.60	48.10	30.010	173 52 6.00	+ 2.99	+ 0.34	- 6.04	+ 44 55 10.80
		W	...	...	...	50.35	48.50	29.451	185 52 5.15	+ 3.53	- 0.34	+ 6.04	
18	June 18, H. α Ursæ Minoris S. P.	W	...	13 13 16.0	8 39.8	48.40	46.90	...	232 12 46.36	+ 0.53	+ 3.17	+ 1 11.17	+ 88 46 4.07
		E	...	13 30 44.0	8 48.2	49.05	46.55	...	127 37 58.25	+ 0.66	- 3.27	- 1 11.17	
19	α Cygni	W	...	20 38	...	48.35	47.45	29.470	185 52 5.20	- 0.63	- 0.34	+ 5.92	+ 44 55 9.02
		E	...	...	...	49.95	48.05	30.029	173 52 5.72	+ 0.69	+ 0.34	- 5.92	

Time	Ther (89)	Air ther	Barom.	Observation made at IX with movable thread except as noted below	No.	Zenith point.	Red. to 1899.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>				
14 34 22	81.1	—	—	2, 4, 6, 8, 14, 16, 17	1	129.55 18.62	—
34 35	80.9	—	—	10, 18	2	18.32	—
34 37	80.9	—	—	11	3	17.92	1 4 41
34 38	80.2	—	—	—	4	19.68	1 14 52
34 39	80.4	79.5	29.816	—	5	18.88	1 10 11
34 40	79.9	—	—	—	6	18.32	1 4 41
34 41	79.9	—	—	—	7	17.90	1 6 29
34 42	79.7	79.9	29.816	—	8	19.60	—
34 43	79.7	79.5	29.806	—	9	19.64	—
34 44 35	80.9	81.5	29.719	—	10	22.32	—
34 45 21	81.9	80.6	29.735	—	11	24.12	—
34 48	81.9	—	—	—	12	26.38	1 6 1
34 49	—	81.5	29.774	—	13	19.58	—
34 50	82.1	—	—	—	14	18.72	1 2 23
34 51	82.1	—	—	—	15	21.00	1 6 26
34 52	81.9	—	—	—	16	19.36	—
34 53	81.8	—	—	—	17	22.00	—
34 57	84.7	84.5	29.776	—	18	22.84	—
34 58	84.7	84.5	29.776	—	19	19.34	—
34 59	82.7	82.5	29.766	—	—	—	—

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
June 19, H.													
1	α Ursæ Minoris S. P.	E W	...	$h\ m\ s$ 13 15 52.0 13 20 12.0	$m\ s$ 6 6.9 7 13.1	d 50.15 48.35	d 49.85 48.95	r	$^{\circ}\ ' \ ''$ 127 37 54.72 232 12 49.29	$''$ + 2.06 + 0.80	$''$ - 1.58 + 2.20	$''$ - 1 10.36 + 1 10.36	$^{\circ}\ ' \ ''$ +88 46 4.43 ...
2	7 Boötis	W E	...	13 48 ...	...	47.40 49.85	48.30 50.25	30.820 28.578	159 22 8.90 200 22 7.00	- 0.39 + 1.67	- 0.11 + 0.11	20.39 + 20.39	+18 25 41.87 ...
3	2 Libræ	W E	...	14 18 ...	...	49.80 49.75	49.80 50.00	30.363 29.318	129 42 3.28 230 2 0.02	+ 1.44 + 1.51	+ 0.06 - 0.06	- 1 5.46 + 1 5.46	- 11 15 25.80 ...
4	5 Ursæ Minoris	E W	...	14 28 ...	...	51.10 49.60	50.70 49.40	28.530 30.891	142 40 7.05 217 4 4.58	+ 3.49 + 2.17	+ 0.22 - 0.22	41.53 + 41.53	+70 8 44.20 ...
June 20, H.													
5	ϵ Virginis	W E	...	12 57 ...	...	48.55 49.85	48.80 50.15	31.277 28.061	152 26 10.20 207 18 5.68	- 0.56 + 0.69	- 0.07 + 0.07	27.63 + 27.63	+11 29 56.27 ...
6	α Ursæ Minoris S. P.	W E	...	13 13 44.0 13 31 0.0	8 18.1 9 6.9	50.25 49.10	50.05 49.40	... ...	232 12 48.44 127 37 57.10	+ 1.85 + 1.00	+ 2.01 - 3.51	+ 1 9.14 - 1 9.12	+88 46 4.80 ...
7	τ Boötis	W E	...	13 43 ...	...	50.45 49.50	49.65 49.70	30.407 28.930	158 54 9.30 200 50 7.62	+ 0.73 + 0.31	- 0.11 + 0.11	20.57 + 20.57	+17 57 27.20 ...
8	α Draconis	W E	...	14 2 ...	...	51.25 50.15	50.55 49.80	29.405 29.929	205 48 6.55 153 56 7.02	+ 1.53 + 0.66	- 0.73 + 0.73	+ 26.16 - 26.16	+64 51 31.60 ...
9	ξ Boötis	E W	...	14 47 ...	...	49.55 51.90	49.75 51.45	29.371 29.786	190 16 7.70 160 28 7.90	+ 1.81 + 3.73	+ 0.12 - 0.12	+ 10.00 - 10.01	+19 31 7.07 ...
June 21, H.													
10	ϵ Virginis	W E	...	12 57 ...	...	51.40 47.05	51.15 47.05	31.340 28.231	152 26 4.18 207 18 1.08	+ 4.47 + 0.49	- 0.07 + 0.07	28.05 + 28.05	+11 29 55.57 ...
11	43 Comæ Berenices	W E	...	13 7 ...	...	51.35 46.95	51.15 47.70	29.938 29.498	169 20 6.68 190 24 5.90	+ 4.45 + 0.77	- 0.18 + 0.18	- 10.06 + 10.06	+28 23 17.64 ...
12	α Virginis	W E	...	13 20 ...	...	51.25 46.75	51.30 47.65	31.828 30.763	130 18 3.12 229 24 1.65	+ 4.48 + 0.65	+ 0.06 - 0.06	- 1 3.47 + 1 3.47	- 10 38 22.34 ...
13	η Ursæ Majoris	E W	...	13 44 ...	...	48.35 53.00	48.85 52.40	30.317 29.024	168 58 5.15 190 46 5.52	+ 3.65 + 7.28	+ 0.40 - 0.40	10.48 + 10.48	+49 49 2.35 ...
14	d Boötis	W E	...	14 6 ...	...	52.60 47.15	52.25 48.15	31.241 28.279	166 30 4.40 193 14 5.55	+ 5.56 + 1.07	- 0.16 + 0.16	- 12.95 + 12.95	+25 34 5.71 ...
15	λ Virginis	W E	...	14 14 ...	...	53.15 47.00	52.85 47.65	31.555 28.083	128 2 2.68 231 42 2.08	+ 6.11 + 0.77	+ 0.07 - 0.07	- 1 9.34 + 1 9.36	- 12 54 38.76 ...
16	ξ^1 Libræ	W E	...	14 40 ...	...	54.05 46.55	53.10 46.90	30.248 29.242	129 28 5.55 230 16 4.98	+ 6.64 + 0.19	+ 0.06 - 0.06	- 1 0.13 + 1 6.13	- 11 29 25.35 ...
June 22, H.													
17	57 B. Ursæ Minoris	W E	...	15 10 ...	...	52.95 51.00	54.25 52.55	28.611 28.290	228 33 53.12 131 12 3.22	+ 2.02 + 0.30	- 1.20 + 1.20	+ 1 3.18 - 1 3.18	+87 37 20.92 ...
18	μ Boötis	E W	...	15 21 ...	...	50.60 53.00	51.90 54.55	28.773 30.503	181 4 8.32 178 40 6.95	+ 0.83 + 3.21	+ 0.26 - 0.26	+ 1.16 - 1.16	+37 43 51.07 ...
19	12 H. Draconis	W E	...	15 45 ...	...	53.15 51.05	54.25 52.70	31.268 28.261	203 50 4.98 155 54 5.62	+ 1.67 - 0.05	- 0.65 + 0.65	+ 24.80 24.80	+62 54 42.75 ...

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.						No.	Zenith point.	Red. to 1890.0.
$d\ h\ m$	$^{\circ}$	$^{\circ}$	$in.$									
19 13 23	78.9	78.0	29.815	1.	Observation assumed as at VII with fixed thread.					1	179 55 23.74	...
13 48	78.2	...	...	4.	Observation at III.					2	208.48	+ 8.61
14 3	76.8	77.0	29.815	0.	Observation assumed as at III with fixed thread.					3	209.70	+ 10.40
14 28	76.7	...	...	9.11 18.	Observation at I.					4	21.00	...
15 4	76.0	...	29.817	17.	Observation at VII.					5	18.67	...
20 12 42	88.4	88.0	29.691							6	23.90	...
11 22	85.9	...	...							7	19.62	...
11 43	84.5	...	...							8	18.46	...
11 51	84.2	82.5	29.694							9	17.54	+ 6.73
14 55	81.0	81.0	29.697							10	20.55	...
21 12 46	82.9	81.0	29.825							11	21.56	...
11 7	82.9	...	...							12	22.03	...
13 20	81.0	...	...							13	21.52	...
11 44	79.8	...	...							14	22.60	...
11 51	78.9	74.0	29.845	9 E.	One microscope reading decreased 10".					15	22.63	...
14 14	78.1	...	...	to W.	Micrometer reading increased 1 rev.					16	22.46	+ 14.51
14 49	76.8	...	...							17	20.24	...
15 0	...	72.9	29.876							18	19.06	...
22 15 0	71.9	74.8	29.924							19	20.68	- 1.95
15 41	71.9	...	...							
15 45	70.8	...	...							

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	ϵ Herculis	W		15 57		53.70	54.70	30.950	150 2 6.32	+ 2.14	- 0.11	- 21.21	+18 5 47 19
		E				50.45	52.25	28.481	200 42 6.50	- 0.54	+ 0.11	+ 21.21	
2	α Cygni	W		20 38		53.90	54.95	29.469	185 52 5.18	+ 2.17	- 0.34	+ 5.92	+44 55 11.63
		E				50.75	52.10	30.041	173 52 5.92	- 0.66	+ 0.34	- 5.92	
3	June 23, H. θ Virginis	W		13 5		48.45	48.55	31.651	135 56 5.72	+ 1.71	+ 0.03	- 52.38	- 5 0 16.24
		E				46.10	46.55	27.832	223 48 4.85	- 0.33	- 0.03	+ 52.38	
4	α Ursæ Minoris s. p.	E		13 15 47.0	6 23.4	45.60	46.40		127 37 57.49	- 0.19	- 1.72	- 10.34	+88 46 3.34
		W		13 28 48.0	6 37.6	48.90	49.15		232 12 50.34	+ 2.65	+ 1.85	+ 10.36	
5	δ Draconis	W		13 49		48.50	48.85	29.232	206 10 5.42	+ 1.89	- 0.74	+ 27.02	+05 13 22.24
		E				46.55	47.35	30.235	153 34 7.52	+ 0.27	+ 0.74	- 27.02	
6	κ Virginis	W		14 8		49.00	49.55	31.610	131 8 3.48	+ 2.45	+ 0.06	- 1 2.29	9 48 29.59
		E				45.90	46.95	27.999	228 36 1.70	- 0.23	- 0.06	+ 1 2.29	
7	γ Boötis	E		14 25		45.90	46.75	29.161	168 30 6.75	+ 1.13	+ 0.40	- 11.04	+50 17 49.58
		W				49.25	49.95	30.188	191 14 6.22	+ 4.22	- 0.40	+ 11.04	
8	ρ Virginis	W		14 41		50.35	50.75	30.175	143 16 3.85	+ 3.65	- 0.01	- 40.78	- 2 18 54.78
		E				45.70	46.90	29.321	216 28 4.95	- 0.35	+ 0.01	+ 40.78	
9	June 24, H. α Ursæ Minoris s. p.	E		13 15 54.0	6 18.9	45.30	47.30		127 37 55.28	- 0.05	- 1.68	- 1 9.34	+88 46 3.36
		W		13 28 56.0	6 43.1	47.45	49.05		232 12 51.08	+ 1.79	+ 1.90	+ 1 9.36	
10	τ Boötis	W		13 43		47.05	48.60	30.502	158 54 8.20	+ 0.95	- 0.11	- 20.62	+17 57 28.70
		E				45.85	47.80	28.897	200 50 9.20	+ 0.01	+ 0.11	+ 20.62	
11	η Virginis	W		13 51		47.60	49.20	32.437	142 28 6.20	+ 1.49	- 0.01	- 41.10	+ 1 32 26.59
		E				46.05	48.20	26.988	217 16 7.78	+ 0.29	+ 0.01	+ 41.10	
12	λ Boötis	E		14 13		46.20	47.90	30.048	172 14 9.50	+ 1.67	+ 0.36	- 7.25	+46 33 6.78
		W				47.65	49.20	29.184	187 30 9.85	+ 2.97	- 0.36	+ 7.25	
13	204 B. Boötis	W		14 26		48.20	49.95	29.219	183 12 9.25	+ 2.12	- 0.30	+ 3.15	+42 15 3.96
		E				46.55	48.05	30.019	176 32 9.38	+ 0.45	+ 0.30	- 3.15	
14	π Boötis	W		14 36		48.25	50.20	29.682	157 48 8.95	+ 2.27	- 0.10	- 21.90	+ 16 50 56.80
		E				45.95	47.95	29.588	201 56 10.52	+ 0.12	+ 0.10	+ 21.90	
15	June 25, H. α Cygni	W		20 38		48.35	52.15	29.476	185 52 6.40	+ 0.11	- 0.34	+ 5.90	+44 55 11.72
		E				47.35	51.50	30.012	173 52 6.32	- 0.66	+ 0.34	- 5.90	
16	June 29, H. γ Ursæ Majoris	W		13 44		48.80	48.45	29.210	190 46 4.72	- 0.47	- 0.40	+ 10.57	+40 40 3.91
		E				50.65	50.20	30.322	168 58 3.88	+ 1.23	+ 0.40	- 10.57	
17	α Draconis	E		14 2		51.30	50.35	29.944	153 56 2.62	+ 3.97	+ 0.73	- 26.82	+64 51 33.08
		W				50.95	49.75	29.499	205 48 1.85	+ 2.61	- 0.73	+ 26.81	
18	δ Boötis	W		14 13		50.90	49.80	30.578	192 46 2.82	+ 1.15	- 0.43	- 12.72	+51 50 1.51
		E				50.90	50.05	28.970	166 58 3.30	+ 1.27	+ 0.43	- 12.72	
Time		Ther- 1882	Att. ther	Barom.	Observation made at IX with movable thread, except as noted below						No	Zenith point	Red. to 1899 0
<i>h m s</i>	<i>°</i>	<i>°</i>	<i>mm.</i>	Observation assumed as at VII with fixed thread.								<i>° ' "</i>	<i>°</i>
22 16 5	79.7	71.0	30.025	7.12.17. Observation at I.						1	170 55	19.90	4.29
22 16 11	79.9	68.0	30.062							2		20.48	
23 12 09	82.9	86.0	30.045							3		19.60	
23 12 22	82.8									4		25.22	
23 12 36		80.0	30.029							5		26.86	0.54
24 8	79.9									6		19.89	
24 25	78.7									7		26.06	0.28
24 51	78.1	77.1	30.011							8		19.94	
25 11 7	86.1	89.9	29.924							9		24.17	
25 11 25	86.1									10		21.08	
25 11 43	87.1									11		20.15	13.44
25 11 59	86.5	85.5	29.916							12		26.50	
26 1	84.5									13		19.22	1.19
26 17	84.4									14		20.21	
26 35	84.5									15		19.92	
26 50		82.7	29.911							16		19.49	
27 10 15	84.9	86.5	29.994							17		19.87	
27 11 40	85.9	71.1	29.865							18		19.22	1.21
27 12	84.8												
27 17	86.9	79	29.899										

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W		20 38		54.40	53.05	29.588	185 52 1.68	+ 4.33	- 0.34	+ 5.94	+44 55 14.92
	June 30, H.	E				49.45	48.60	30.028	173 52 2.88	- 0.09	+ 0.34	- 5.94	
2	α Virginis	W		13 20		54.40	51.85	31.857	130 18 4.42	+ 0.53	+ 0.06	- 4.15	-10 38 21.67
		E				53.45	51.45	27.648	229 26 5.48	- 0.11	- 0.06	+ 4.15	
3	ζ Virginis	W		13 30		55.25	52.10	30.329	140 52 7.25	+ 1.03	0.00	- 44.31	- 0 5 0.35
		E				53.15	50.70	29.101	218 52 4.50	- 0.61	0.00	+ 44.31	
4	γ Ursæ Majoris	E		13 44		54.45	51.45	30.192	168 58 7.30	+ 1.81	+ 0.40	- 10.58	+49 49 3.67
		W				55.45	52.55	29.038	190 46 7.05	+ 2.81	- 0.40	+ 10.58	
5	α Draconis	W		14 2		47.50	51.70	29.512	205 48 4.08	+ 0.45	- 0.73	+ 26.77	+64 51 33.49
		E				47.50	51.95	29.967	153 56 3.88	+ 0.57	+ 0.73	- 26.78	
6	α Boötis	E		14 11		47.50	52.05	27.529	199 6 6.58	+ 2.08	+ 0.12	+ 19.23	+19 42 23.13
		W				49.05	53.05	31.742	160 38 4.92	+ 3.27	- 0.12	- 19.23	
7	φ Virginis	W		14 23		48.65	52.95	30.939	139 10 2.42	+ 1.58	+ 0.01	- 47.49	- 1 46 45.09
		E				46.40	51.15	28.711	220 34 3.92	- 0.33	- 0.01	+ 47.49	
8	ζ Boötis	E		14 36		47.30	51.40	28.707	204 38 1.38	+ 1.67	+ 0.08	+ 25.52	+14 9 35.17
		W				49.50	53.45	30.783	155 6 2.75	+ 3.67	- 0.08	- 25.52	
9	δ Boötis	E		15 11		47.40	51.60	29.292	185 6 5.35	+ 1.81	+ 0.22	+ 5.09	+33 41 28.41
		W				49.60	53.50	30.050	174 38 6.55	+ 3.75	- 0.22	- 5.09	
10	θ Ursæ Minoris	E		15 34		47.55	51.55	27.892	141 8 4.42	+ 1.86	+ 1.54	- 44.65	+77 41 13.10
		W				49.50	53.20	28.573	218 38 1.68	+ 3.55	- 1.54	+ 44.64	
11	χ Herculis	W		15 49		49.00	53.00	30.784	183 40 4.88	+ 1.77	- 0.31	+ 3.71	+42 44 3.14
	July 1, H.	E				46.80	51.10	28.691	176 4 5.18	- 0.16	+ 0.31	- 3.71	
12	γ Boötis	W		13 50		47.55	52.40	31.416	159 50 6.55	- 0.47	- 0.11	- 19.99	+18 54 6.82
		E				47.80	52.50	28.023	199 54 4.48	- 0.30	+ 0.11	+ 19.99	
13	α Draconis	E		14 2		48.40	52.80	29.870	153 56 5.72	+ 1.58	+ 0.73	- 26.79	+64 51 33.57
		W				47.90	52.25	29.473	205 48 4.08	+ 1.09	- 0.73	+ 26.78	
14	α Boötis	W		14 11		48.40	52.90	31.773	160 38 5.78	+ 0.17	- 0.12	- 19.20	+19 42 21.87
		E				47.65	52.30	30.576	199 4 6.28	- 0.47	+ 0.12	+ 19.20	
15	ε Boötis	W		14 41		48.30	53.20	30.945	168 26 6.28	+ 0.27	- 0.18	- 11.17	+27 29 57.35
		E				47.80	52.40	28.446	191 18 4.92	- 0.35	+ 0.18	+ 11.17	
16	β Ursæ Minoris	E		14 51		48.00	52.45	29.359	144 14 4.42	+ 1.23	+ 1.21	- 39.68	+74 34 10.71
		W				48.30	53.30	30.098	215 30 4.82	+ 1.77	- 1.21	+ 39.67	
17	ε Boötis	W		15 3		49.00	53.45	30.591	166 12 6.78	+ 0.71	- 0.16	- 13.46	+25 15 41.10
		E				47.95	52.15	28.759	193 32 6.48	- 0.40	+ 0.16	+ 13.46	
18	ι H. Ursæ Minoris	E		15 13		48.20	52.20	29.516	151 4 6.05	+ 1.20	+ 0.82	- 30.47	+67 43 51.77
		W				49.40	53.45	29.804	208 40 4.02	+ 2.35	- 0.82	+ 30.47	
19	ν ¹ Boötis	W		15 27		49.45	53.65	31.600	182 6 6.90	+ 1.01	- 0.29	+ 2.18	+41 10 39.65
		E				47.95	51.90	27.667	177 38 6.88	- 0.52	+ 0.29	- 2.18	

Time	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
29 20 45	62.0	64.3	29.929	4, 6, 8, 9, 10, 13, 16, 18. Observation at I.	1	179 55 20.74	
30 12 52	79.7	78.0	30.026		2	19.22	
13 10	79.9				3	18.62	
13 51	77.9				4	17.94	
14 2	76.7	78.3	30.006		5	18.02	
14 11	76.6				6	17.52	
14 23	74.9				7	20.82	+12.77
14 46	74.3				8	18.50	
14 57		72.0	30.011		9	19.48	
15 11	72.3				10	17.75	- 4.62
15 34	71.7				11	18.70	- 1.27
16 1	71.3	70.6	30.022		12	17.84	
1 13 45	78.9	77.5	30.025		13	17.00	
14 2	77.0				14	18.02	
14 11	77.0				15	17.30	
14 47	74.9	74.5	30.022	Note. 11 W. Micrometer reading increased 2 rev.	16	19.20	
14 51	74.3				17	17.70	+ 3.24
15 3	74.3				18	17.10	
15 13	73.6				19	16.36	
15 17	73.8	72.0	30.025				

No	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W	...	20 38	...	48.95	53.00	29.558	185 52 4.32	+ 0.47	- 0.34	+ 5.90	+44 55 14.79
	July 2, H.	E	...			48.50	52.50	29.928	173 52 4.68	+ 0.02	+ 0.34	- 5.90	
2	α Draconis	W	...	14 2	...	45.80	50.25	29.531	205 48 4.98	- 0.68	- 0.73	+ 26.38	+64 51 33.15
		E	...			48.50	53.25	29.870	153 50 6.82	+ 2.01	+ 0.73	- 26.38	
3	α Boötis	E	...	14 11	...	48.45	52.80	30.486	199 4 6.78	+ 3.23	+ 0.12	+ 18.95	+19 42 22.59
		W	...			47.25	51.35	31.748	160 38 6.45	+ 1.97	- 0.12	- 18.95	
4	γ Boötis	W	...	14 22	...	46.50	51.00	29.430	160 38 5.88	+ 0.01	- 0.12	- 19.00	+19 40 45.21
		E	...			47.95	52.55	29.968	199 6 7.22	+ 1.42	+ 0.12	+ 19.00	
5	ζ Boötis	E	...	14 36	...	48.30	52.45	28.618	204 38 5.45	+ 2.99	+ 0.08	+ 25.17	+14 9 34.80
		W	...			48.25	52.50	30.779	155 6 4.10	+ 2.99	- 0.08	- 25.17	
6	57 B. Ursæ Minoris	E	...	15 10	...	48.20	52.25	28.209	131 12 1.28	+ 2.41	+ 1.29	- 2.17	+87 37 22.01
		W	...			48.25	52.60	28.430	228 34 0.92	+ 2.60	- 1.29	+ 2.17	
7	α Cygni	E	...	20 38	...	48.10	52.10	29.892	173 52 4.62	+ 2.73	+ 0.34	- 5.88	+44 55 15.29
	July 9, H.	W	...			49.05	53.05	29.533	185 52 4.48	+ 3.63	- 0.34	+ 5.88	
8	α Cygni	W	...	20 38	...	53.00	49.55	29.899	185 51 57.58	- 0.56	- 0.34	+ 5.90	+44 55 17.37
	July 10, H.	E	...			57.40	53.20	30.043	173 51 57.70	+ 3.23	+ 0.34	- 5.89	
9	α Cygni	W	...	20 38	...	55.70	52.05	29.812	185 51 59.10	- 0.71	- 0.34	+ 5.89	+44 55 17.37
	July 11, H.	E	...			56.35	52.60	30.015	173 52 0.02	- 0.14	+ 0.34	- 5.89	
10	γ Boötis	W	...	14 28	...	47.95	50.35	32.398	179 40 3.75	+ 0.15	- 0.27	- 0.16	+38 45 1.15
		E	...			48.50	50.50	27.268	180 4 3.20	+ 0.47	+ 0.27	+ 0.16	
11	ϵ Boötis	E	...	14 41	...	48.40	50.45	28.512	191 18 1.05	+ 1.87	+ 0.18	+ 11.03	+27 29 58.22
		W	...			49.10	50.85	31.071	168 26 1.48	+ 2.38	- 0.18	- 11.03	
12	β Ursæ Minoris	W	...	14 51	...	49.00	50.70	30.322	215 30 0.72	+ 0.81	- 1.21	+ 39.25	+74 34 11.29
		E	...			48.95	50.50	29.571	144 13 58.42	+ 0.68	+ 1.21	- 39.24	
13	δ Boötis (<i>n. fol.</i>)	E	...	15 0	...	48.30	50.05	30.650	170 44 0.75	+ 1.63	+ 0.37	- 8.80	+48 2 54.75
		W	...			49.10	51.00	29.137	189 0 0.90	+ 2.45	- 0.37	+ 8.80	
14	γ Coronæ Borealis	W	...	15 19	...	50.05	51.65	29.882	171 35 59.68	+ 1.75	- 0.20	- 7.96	+30 39 9.67
		E	...			48.25	50.10	26.922	188 9 59.90	+ 0.17	+ 0.20	+ 7.96	
15	δ^2 Boötis	E	...	15 28	...	48.65	50.10	27.993	177 34 0.50	+ 1.81	+ 0.29	- 2.23	+41 14 33.97
		W	...			49.70	51.50	31.652	182 10 0.55	+ 2.97	- 0.29	+ 2.23	
16	γ Coronæ Borealis	W	...	15 39	...	50.55	51.85	32.696	167 31 58.25	+ 2.07	- 0.17	- 11.98	+26 36 57.40
		E	...			47.80	49.60	27.240	192 11 57.72	- 0.28	+ 0.17	+ 11.98	
17	ζ Herculis	E	...	16 38	...	48.30	49.70	29.883	187 0 0.15	+ 1.46	+ 0.21	+ 6.92	+31 47 10.61
		W	...			52.10	53.20	29.889	172 43 58.55	+ 4.89	- 0.21	- 6.92	
18	ι Ophiuchi	W	...	16 49	...	52.05	53.45	31.530	151 15 57.05	+ 3.53	- 0.06	- 30.10	+10 19 53.85
		E	...			47.45	49.20	28.322	208 27 58.20	- 0.63	+ 0.06	+ 30.10	
19	α Cygni	W	...	20 38	...	53.55	54.50	29.800	185 51 57.98	+ 4.73	- 0.34	+ 5.87	+44 55 18.25
		E	...			47.40	49.45	30.130	173 51 57.38	- 0.54	+ 0.34	- 5.87	

Time	Ther. 1899.	Air ther.	Barom.	Observation made at IX with movable thread, except as noted below	No.	Zenith point.	Red. to 1899.0.
1 25 26	82.1	65.0	29.922	3 5. 7 11. 13. 15. 17 Observation at I.	1	179 55 18.42	
2 38 41	83.1	64.0	29.926	6 Observation at III.	2	18.52	
3 11 11	82.0				3	19.09	
4 11 29	81.5				4	19.16	
5 11 46	80.0				5	19.64	
6 11 43		60.5	29.917		6	19.16	
7 11 59	78.5				7	20.17	
8 11 43		58.0	29.918		8	21.56	
9 11 47	66.9		29.917		9	19.58	
10 11 26	64.9		29.918		10	21.16	
11 11 25	66.2		29.917		11	19.66	
12 11 4 0	86.9	79.5	29.921		12	22.32	
13 11 41	79.5				13	22.70	-3.04
14 11 51	78.2				14	19.42	
15 11 5	78.1			Notes.	15	19.34	-4.68
16 11 8	78.8	76.5	29.918	13 E. One microscope reading decreased 10".	16	21.76	-4.16
17 11 28	76.8			16 E. One level reading decreased 1 div.	17	22.64	
18 11 59	76.8				18	20.54	-4.11
19 11 8		74.5	29.928		19	22.70	
20 11 15	74.7						
21 11 5	74.8		29.931				
22 11 45	67.8		29.931				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	July 18, H. Librae	E W		15 12		47.00 55.65	48.95 56.10	28.531 31.193	227 47 58.95 131 55 56.40	+ 2.35 + 9.79	- 0.05 + 0.05	+1 0.27 -1 0.27	- 9 0 46.71
2	β Serpentis	E W		15 42		46.65 55.50	49.00 56.60	27.910 31.704	203 4 0.08 156 40 1.20	+ 2.22 + 9.97	+ 0.09 - 0.09	+ 23.43 - 23.43	+15 44 15.11
3	γ Serpentis	W E		15 52		54.55 45.70	55.95 48.50	30.658 29.121	156 55 57.42 202 47 59.70	+ 7.75 + 0.08	- 0.09 + 0.09	- 23.16 + 23.16	+15 59 27.55
4	α Cygni	W E		20 38		55.85 46.35	56.55 48.65	29.752 30.089	185 51 58.78 173 51 57.50	+ 8.64 + 0.45	- 0.34 + 0.34	+ 5.83 - 5.83	+44 55 20.07
5	July 19, H. Boötis	W E		14 58		54.30 44.95	56.00 47.50	29.793 29.810	181 44 5.75 178 0 6.30	+ 8.32 - 0.09	- 0.29 + 0.29	+ 1.77 - 1.76	+40 47 21.79
6	μ Boötis	W E		15 21		56.00 45.55	57.65 48.30	30.691 29.027	178 40 2.80 181 4 2.30	+ 9.90 + 0.57	- 0.26 + 0.26	- 1.13 + 1.13	+37 43 54.23
7	μ Serpentis	E W		15 44		45.25 55.85	48.40 57.90	26.851 27.021	221 55 59.78 137 52 0.22	+ 1.94 +11.41	- 0.02 + 0.02	+ 48.93 - 48.93	- 3 7 23.75
8	July 20, H. Coronæ Borealis	W E		15 36		47.85 36.85	49.40 39.90	30.530 28.948	177 54 6.20 181 50 6.58	+10.01 + 0.36	- 0.25 + 0.25	- 1.85 + 1.85	+36 57 51.57
9	July 22, H. Cygni	W E		20 38		50.25 36.50	52.55 40.20	29.738 30.029	185 52 1.12 173 52 2.45	+11.89 - 0.39	- 0.34 + 0.34	+ 5.76 - 5.76	+44 55 21.70
10	July 27, H. Coronæ Borealis	W E		15 30		49.50 38.45	51.85 42.35	30.072 29.690	168 0 2.02 191 44 2.30	+ 9.43 - 0.25	- 0.17 + 0.17	- 11.22 + 11.23	+27 3 17.85
11	July 31, H. H ¹ . Draconis	W E		15 55		52.00 52.35	48.90 49.70	30.923 28.860	195 58 1.88 163 46 2.45	- 0.71 - 0.16	- 0.48 + 0.48	+ 15.78 - 15.78	+55 2 13.63
12	19 Ursæ Minoris	E W		16 14		53.70 53.65	51.40 50.30	29.680 29.985	142 40 1.92 217 4 4.12	+ 2.74 + 2.19	+ 1.36 - 1.36	- 41.55 + 41.55	+76 8 4.00
13	114 B. Draconis	W E		16 43		53.50 52.90	51.20 50.00	30.411 29.348	197 54 1.20 161 50 3.08	+ 1.09 + 0.24	- 0.51 + 0.51	+ 17.90 - 17.89	+56 57 55.33
14	ε Herculis	E W		16 56		53.95 55.30	50.80 51.05	27.638 32.051	187 44 2.68 172 0 1.00	+ 2.57 + 3.31	+ 0.20 - 0.20	+ 7.58 - 7.58	+31 4 38.61
15	σ Ophiuchi	E W		17 22		53.65 55.55	50.45 51.25	28.269 31.463	214 34 1.22 145 10 0.52	+ 2.26 + 3.53	+ 0.02 - 0.02	+ 38.13 - 38.13	+ 4 13 44.10
16	α Cygni	W E		20 38		54.35 53.35	51.35 49.80	29.979 29.924	185 52 0.88 173 52 0.05	+ 1.55 + 0.35	- 0.34 + 0.34	+ 5.86 - 5.86	+44 55 24.42

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>		<i>in.</i>				
18 14 35	78.9	78.5	29.817	1, 2, 7, 12, 14, 15. Observation at I.	1	179 55 22.28	
15 12	78.9	76.0	29.815		2	23.03	
15 34	76.8				3	12.14	
15 42	76.8				4	23.60	
15 52	76.5				5	26.22	
16 35		74.0	29.826		6	26.20	
20 27	69.8	70.5	29.804		7	25.72	
19 14 35	81.8	82.0	29.759		8	25.10	-3.44
15 21	80.7				9	26.96	
15 31	79.7	80.0	29.766		10	26.08	
20 15 2		84.0	29.819	Notes. 3 E. Micrometer reading increased 1 rev. 6, 7, 11. Poor.	11	21.48	-8.51
15 36	83.1				12	22.82	
16 6		81.5	29.831		13	22.07	
22 20 20	77.0	78.0	29.868		14	22.60	
27 15 19	87.5				15	22.48	
15 40		86.5	29.717		16	24.62	
11 15 45	78.0	77.0	29.830				
16 14	76.7						
16 43	75.2						
16 51	74.8	74.5	29.848				
17 40	74.0	74.0	29.856				
20 20	67.8	69.0	29.844				

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
	August 1. H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	70 B. Ursæ Minoris	W E		16 35		52.40 50.05	50.50 48.60	31.520 31.379	218 33 50.78 141 7 59.22	+ 1.53 - 0.47	- 1.53 + 1.53	+ 43.93 - 43.93	+ 77 39 3.50
2	20 Ophiuchi	W E		16 44		52.95 50.05	51.15 48.05	32.151 33.809	130 19 58.28 229 19 55.78	+ 2.10 - 0.45	+ 0.06 - 0.00	- 1 4.14 + 1 4.14	- 10 36 18.66
3	5 Ursæ Minoris	E W		16 56		49.95 53.15	48.45 51.10	29.627 30.353	136 35 57.30 223 7 58.12	+ 0.43 + 3.19	+ 0.39 - 0.39	- 51.63 + 51.63	+ 82 12 24.61
4	5 Draconis	W E		17 8		53.65 50.20	51.40 48.50	31.231 28.848	200 45 56.65 152 57 58.32	+ 2.55 - 0.45	- 0.76 + 0.76	+ 27.89 - 27.89	+ 05 50 33.22
5	α Cygni	W E		20 38		53.80 50.50	51.70 48.35	30.019 29.947	185 52 9.90 173 52 8.62	+ 2.70 - 0.38	- 0.34 + 0.34	+ 5.82 - 5.82	+ 44 55 25.43
6	August 2. H. 8 Cygni	W E		19 28		52.25 50.00	50.65 49.40	31.938 28.014	175 10 10.10 184 34 9.20	+ 1.23 - 0.13	- 0.22 + 0.22	+ 4.53 + 4.53	+ 34 14 33.26
7	15 Cygni	E W		19 41		50.55 52.70	49.55 50.80	27.564 32.281	181 42 9.52 178 2 9.88	+ 1.37 + 2.97	+ 0.25 - 0.25	+ 1.74 - 1.75	+ 37 0 52.06
8	ϕ Aquilæ	W E		19 52		52.55 50.55	50.70 49.35	34.071 34.797	152 4 9.15 207 34 7.40	+ 1.39 - 0.19	- 0.06 + 0.06	- 29.11 + 29.11	+ 11 9 34.42
9	20 Vulpeculæ	E W		20 8		50.80 53.10	49.45 51.40	27.240 32.661	192 38 8.38 167 6 6.50	+ 1.44 + 3.44	+ 0.16 - 0.16	+ 12.51 - 12.51	+ 26 10 54.83
10	α Cygni	E W		20 38		50.15 54.00	48.80 51.75	29.885 30.025	173 52 9.18 185 52 8.28	+ 0.83 + 4.03	+ 0.34 - 0.34	- 5.82 + 5.82	+ 44 55 26.25
11	August 3. H. Sagittæ	W E		19 33		51.50 48.55	50.00 48.80	32.128 30.732	157 10 10.85 202 32 11.25	+ 1.93 - 0.44	- 0.09 + 0.09	- 22.85 + 22.85	+ 16 14 23.30
12	ϕ Cygni	E W		19 53		48.75 52.85	48.85 51.60	28.369 28.361	166 38 12.95 193 8 11.58	+ 1.13 + 4.35	+ 0.43 - 0.43	- 12.89 + 12.89	+ 52 10 29.98
13	August 7. H. δ Herculis	W E		17 11		52.60 46.80	51.00 46.95	30.732 29.104	165 54 9.30 193 50 11.80	+ 4.78 - 0.28	- 0.16 + 0.16	- 13.65 + 13.64	+ 24 57 37.49
14	51 B. Cygni	W E		19 33		53.45 47.40	52.35 47.20	32.492 33.390	184 24 8.60 175 16 7.88	+ 5.39 + 0.12	- 0.32 + 0.32	+ 4.41 - 4.41	+ 43 29 5.53
15	δ Sagittæ	E W		19 43		47.35 53.55	46.90 52.20	29.317 30.543	200 30 7.85 159 14 6.10	+ 1.41 + 6.83	+ 0.11 - 0.11	+ 20.82 - 20.82	+ 18 17 22.71
16	α Cygni	W E		20 38		53.30 46.80	52.15 47.10	30.032 29.933	185 52 7.78 173 52 8.28	+ 5.23 - 0.21	- 0.34 + 0.34	+ 5.82 - 5.82	+ 44 55 26.74
17	August 8. H. Cygni	W E		19 27		46.35 42.00	50.00 46.45	32.350 33.522	192 26 9.95 167 14 7.70	+ 3.45 - 0.27	- 0.42 + 0.42	+ 12.45 - 12.45	+ 51 31 7.87
18	ζ Sagittæ	W E		19 45		47.00 42.90	50.05 46.55	33.850 32.019	159 48 8.10 199 52 7.90	+ 3.77 + 0.19	- 0.11 + 0.11	- 20.30 + 20.30	+ 18 53 35.64
19	63 Sagittarii	E W		19 56		43.00 47.00	46.95 50.05	25.496 25.792	232 44 3.22 127 6 6.42	+ 1.89 + 5.23	- 0.08 - 0.08	+ 13.37 - 13.37	+ 13 54 47.21

Time	Ther. 1899.	At- ther	Barom.	Observation made at IX with movable thread, except as noted below					No.	Zenith point	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>								
1 15 22	70.2	80.0	29.916	Observation at III.					1	159 55 21.50	- 11.11
16 44	70.2			7, 9, 10, 12, 15, 19. Observation at I.					2	21 71	- 3.66
16 56	70.2								3	23 30	
17 22	70.1	70.1	29.906						4	24 12	
20 21	70.1	71.0	29.921						5	15 91	
19 29	70.8	71.0	29.787						6	15 49	- 15.11
19 17	70.8								7	14 89	- 15.40
19 12	70.8								8	14 12	- 15.49
20 8	70.8								9	15 04	- 15.26
20 18	70.7	71.5	29.725						10	15 06	
19 22	70.5	70.5	29.779						11	14 18	- 14.11
20 21	76.0	76.0	29.764						12	15 17	
19 25	70.9	74.8	29.744	Notes					13	15 09	
19 16	70.7	73.0	29.760	7 W Micrometer reading increased 1 rev.					14	15 28	- 16.00
19 11	70.1			Poor					15	15 42	
20 45	69.9	71.1	29.764						16	14 00	
19 16	69.9	69.9	29.764						17	14 30	
19 13	67.9								18	15 09	- 15.54
19 06	67.9								19	15 09	- 14.40

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Aquilæ	W	...	20 10	...	46.90	49.85	31.087	155 50 9.35	+ 3.63	- 0.08	- 24.84	+14 53 40.06
		E	...	...	...	42.85	46.45	31.768	203 52 8.62	+ 0.12	+ 0.08	+ 24.84	
2	α Cygni	E	...	20 38	...	42.90	46.50	29.885	173 52 8.90	+ 1.63	+ 0.34	- 5.87	+44 55 26.41
		W	...	...	...	47.00	50.10	29.985	185 52 9.42	+ 5.25	- 0.34	+ 5.87	
3	August 20, H. θ Cygni	W	...	19 34	...	50.10	50.45	30.098	190 56 9.35	+ 2.83	- 0.40	+ 10.60	+49 59 35.24
		E	...	...	...	47.25	47.55	29.757	168 48 9.42	+ 0.12	+ 0.40	- 10.60	
4	ϕ Cygni	W	...	19 53	...	50.55	50.15	28.547	193 8 10.68	+ 2.89	- 0.43	+ 12.78	+52 10 34.64
		E	...	...	...	46.80	47.45	28.360	166 38 10.30	- 0.13	+ 0.43	- 12.77	
5	ρ Aquilæ	E	...	20 10	...	46.55	46.95	28.699	203 54 11.45	+ 0.97	+ 0.08	+ 24.18	+14 53 41.07
		W	...	...	...	51.40	50.50	31.028	155 50 9.48	+ 4.92	- 0.08	- 24.18	
6	α Cygni	W	...	20 24	...	51.25	50.85	32.229	179 2 9.32	+ 3.55	- 0.26	- 0.76	+38 6 51.14
		E	...	...	...	46.80	47.25	27.623	180 42 10.42	- 0.23	+ 0.26	+ 0.76	
7	α Cygni	E	...	20 38	...	46.50	46.90	29.649	173 52 10.62	+ 0.92	+ 0.34	- 5.71	+44 55 32.50
		W	...	...	...	51.45	50.95	30.008	185 52 12.42	+ 5.15	- 0.34	+ 5.71	
8	August 22, H. σ Aquilæ	W	...	19 34	...	52.10	52.00	32.281	146 6 9.20	+ 5.33	- 0.03	- 36.42	+ 5 10 18.34
		E	...	...	...	45.95	46.40	30.560	213 36 9.02	- 0.21	+ 0.03	+ 36.42	
9	δ Sagittæ	E	...	19 43	...	46.25	46.85	29.275	200 30 9.05	+ 1.61	+ 0.11	+ 20.54	+18 17 25.35
		W	...	...	...	52.90	52.40	30.591	159 14 7.98	+ 7.35	- 0.11	- 20.54	
10	ϕ Aquilæ	W	...	19 52	...	52.85	52.00	34.120	152 4 5.60	+ 5.67	- 0.06	- 28.71	+11 9 37.52
		E	...	...	...	46.10	46.60	34.743	207 34 6.85	- 0.04	+ 0.06	+ 28.71	
11	β^2 Cygni	E	...	20 6	...	46.35	46.55	27.453	182 16 11.98	+ 1.51	+ 0.25	+ 2.26	+36 32 52.01
		W	...	...	...	53.35	52.45	32.111	177 28 11.15	+ 7.58	- 0.25	- 2.26	
12	α Cygni	E	...	20 38	...	46.10	46.55	29.720	173 52 10.65	+ 1.39	+ 0.34	- 5.75	+44 55 31.17
		W	...	...	...	53.50	52.75	30.018	185 52 10.00	+ 7.79	- 0.34	+ 5.76	
13	August 24, H. 14 Cygni	W	...	19 36	...	53.95	53.55	32.890	183 30 10.22	+ 7.43	- 0.31	+ 3.54	+42 35 25.67
		E	...	...	...	45.70	46.30	26.926	176 14 9.78	+ 0.13	+ 0.31	- 3.54	
14	ζ Sagittæ	E	...	19 45	...	46.25	46.50	25.961	199 56 10.08	+ 1.94	+ 0.11	+ 20.12	+18 53 38.53
		W	...	...	...	55.35	54.10	30.808	159 50 8.22	+ 9.80	- 0.11	- 20.12	
15	69 Aquilæ	W	...	20 24	...	55.95	54.50	33.773	137 42 2.78	+ 8.81	+ 0.02	- 49.94	- 3 12 58.35
		E	...	...	...	45.30	45.20	35.181	221 56 5.12	- 0.59	- 0.02	+ 49.94	
16	August 25, H. 19 Lyræ	W	...	19 8	...	54.50	53.80	32.864	172 2 8.38	+ 7.57	- 0.20	- 7.50	+31 7 12.15
		E	...	...	...	45.50	46.25	32.911	187 38 8.15	- 0.23	+ 0.20	+ 7.50	
17	August 29, H. β Lyræ	W	...	18 46	...	52.60	52.05	32.540	174 10 11.00	+ 4.43	- 0.22	- 5.52	+33 15 1.11
		E	...	...	...	47.85	47.45	33.151	185 30 10.35	+ 0.03	+ 0.22	+ 5.52	
18	η Aquilæ	E	...	19 47	...	48.10	47.60	26.235	218 4 9.32	+ 1.67	0.00	+ 43.88	+ 0 45 3.40
		W	...	...	...	54.50	53.05	27.640	141 44 7.48	+ 7.25	0.00	- 43.88	

Time.	Ther. 1889.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
8 20 10	67.7	...	...	2, 5, 7, 9, 11, 12, 14, 18. Observation at I.	1	179 55 33.33	-17.37
20 44	66.9	67.0	29.836		2	34.12	
20 19 19	79.9	81.0	29.697		3	32.07	
19 53	79.2	...	...		4	32.90	
20 10	78.9	...	...		5	32.01	-19.50
20 24	78.9	...	...		6	32.70	-21.41
20 45	78.3	78.5	29.688		7	31.72	
22 10 18	78.1	79.5	29.801		8	33.85	-16.19
19 43	77.9	...	...		9	34.44	
19 52	77.9	...	...		10	34.19	-18.11
20 6	77.8	...	...		11	31.38	-21.35
20 45	76.7	77.0	29.818		12	33.76	
24 19 17	72.8	76.0	29.824	Notes.	13	34.20	-21.20
19 45	72.2	...	...	2, 3, 6. Poor.	14	33.22	-19.25
20 24	71.8	...	...	3 E, 10 W. One microscope reading increased 10".	15	35.06	-18.78
20 45	...	71.5	29.828	6 W. Micrometer reading decreased 2 rev.	16	34.02	-19.10
25 18 56	79.0	79.0	29.854		17	33.28	
29 18 20	72.5	73.5	30.057		18	31.98	-17.11
19 22	...	71.5	30.065				
19 47	70.2	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>" ' "</i>	<i>° ' "</i>
1	α Cygni	E		20 38		47.65	47.75	29.690	173 52 8.62	+ 1.53	+ 0.34	- 5.88	+44 55 33.66
	September 1, H.	W				55.00	53.70	30.107	185 52 8.00	+ 7.79	- 0.34	+ 5.88	
2	α Cygni	W		20 38		54.15	54.25	30.151	185 52 9.38	+ 5.94	- 0.34	+ 5.80	+44 55 34.54
	September 9, H.	E				40.90	47.70	29.673	173 52 10.80	- 0.56	+ 0.34	- 5.80	
3	μ Aquilæ	W		19 29		50.10	52.35	31.945	148 6 6.95	+11.62	- 0.04	- 34.49	+ 7 10 8.66
	September 11, H.	E				37.40	40.90	30.881	211 36 9.00	+ 0.24	+ 0.04	+ 34.49	
4	ϵ Aquilæ	W		19 25		44.90	46.60	32.730	137 56 3.98	+ 1.25	+ 0.02	- 50.10	- 2 59 42.85
		E				42.75	45.30	33.159	221 44 7.25	- 0.37	- 0.02	+ 50.09	
5	σ Aquilæ	E		19 34		43.05	45.50	30.417	213 36 7.45	+ 1.33	+ 0.03	+ 37.30	+ 5 10 19.98
		W				45.60	47.45	32.432	146 6 4.08	+ 3.44	- 0.03	- 37.30	
6	δ Cygni	W		19 42		45.65	47.55	30.073	185 50 7.35	+ 2.05	- 0.34	+ 5.84	+44 53 27.53
		E				43.25	45.25	29.852	173 54 8.15	- 0.17	+ 0.34	- 5.84	
7	φ Cygni	E		19 53		43.50	45.85	28.197	166 38 6.30	+ 1.70	+ 0.43	- 13.17	+52 10 41.46
		W				46.30	47.70	28.679	193 8 8.28	+ 3.89	- 0.43	+ 13.16	
8	κ Cephei	W		20 12		45.75	47.75	31.190	218 20 7.58	+ 2.19	- 1.50	+ 44.39	+77 24 51.25
		E				42.90	45.10	28.812	141 24 4.20	- 0.40	+ 1.50	- 44.39	
9	α Cygni	E		20 38		42.60	45.30	29.563	173 52 9.02	+ 1.02	+ 0.34	- 5.80	+44 55 37.20
		W				46.55	48.40	30.230	185 52 8.15	+ 4.33	- 0.34	+ 5.80	
10	(7) Iris	W		1 32		51.00	50.85	32.147	161 2 5.78	+ 0.17	- 0.12	- 19.19	+20 6 28.92
	September 12, H.	E				50.00	50.05	27.799	198 42 6.92	- 0.68	+ 0.12	+ 19.19	
11	φ Aquilæ	W		19 51		50.60	52.55	34.082	152 4 11.08	+ 0.54	- 0.06	- 28.87	+11 9 30.66
		E				49.10	51.95	34.586	207 34 7.92	- 0.45	+ 0.06	+ 28.87	
12	β Cygni	W		20 10		50.90	52.85	32.200	187 26 11.48	+ 0.83	- 0.36	+ 7.33	+46 31 2.11
		E				49.10	51.95	33.468	172 14 10.40	- 0.45	+ 0.36	- 7.33	
13	γ Cygni	E		20 25		49.00	51.45	28.084	188 46 11.30	+ 0.73	+ 0.19	+ 8.59	+30 2 19.34
		W				51.00	53.30	31.579	170 58 9.40	+ 2.55	- 0.19	- 8.59	
14	α Cygni	W		20 38		51.00	53.25	30.281	185 52 9.88	+ 1.06	- 0.34	+ 5.79	+44 55 37.36
	September 13, H.	E				49.45	51.95	29.492	173 52 13.22	- 0.28	+ 0.34	- 5.79	
15	ϵ Sagittæ	W		19 33		48.65	48.90	32.251	157 10 7.90	+ 4.83	- 0.09	- 23.41	+16 14 29.96
		E				42.60	44.25	30.589	202 32 7.45	- 0.20	+ 0.09	+ 23.40	
16	δ Sagittæ	E		19 43		43.35	44.50	29.163	200 30 7.75	+ 1.73	+ 0.11	+ 21.10	+18 17 28.92
		W				49.10	49.10	30.640	159 14 9.22	+ 6.59	- 0.11	- 21.10	
17	α Cygni	W		20 38		47.90	47.20	30.264	185 52 8.58	+ 3.67	- 0.34	+ 5.91	+44 55 36.80
	September 14, H.	E				43.65	44.00	29.618	173 52 9.60	+ 0.17	+ 0.34	- 5.91	
18	γ Cygni	W		19 23		49.20	49.45	32.868	177 2 9.08	+ 6.15	- 0.24	- 2.80	+30 7 17.56
		E				42.40	43.20	29.792	182 40 13.22	+ 0.01	+ 0.24	+ 2.80	

Time	Ther. 1882	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below	No.	Zenith point	Red. to 1890
<i>h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				
20 37 45	69.8	70.0	29.958	1, 5, 7, 9, 13, 16. Observation at I	1	179 55 13.00	
20 38 45	74.8	74.5	29.961		2	13.16	
20 39 15	74.9	74.5	29.967		3	35.78	
20 39 45	74.9	74.5	29.976		4	30.47	15.03
20 40 15	74.9				5	10.50	17.95
20 40 45	65.9				6	11.11	
20 41 15	65.9				7	30.48	
20 41 45	64.7				8	11.01	
20 42 15	64.9	64.9	29.971		9	11.22	
20 42 45	64.9	64.5	29.971		10	29.10	
20 43 15	64.9	72.0	29.953		11	40.22	20.28
20 43 45	64.8				12	31.65	26.95
20 44 15	64.8				13	29.40	26.00
20 44 45	64.8				14	11.69	
20 45 15	64.6	70.0	29.966		15	12.14	26.68
20 45 45	64.6		29.984		16	12.89	
20 46 15	64.3				17	12.08	
20 46 45	64.1		29.986		18	12.72	21.84
20 47 15	64.9	60.0	29.966				

Notes
 8 W Micrometer reading increased 1 rev
 10 Parallax 2" 80

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	51 B. Cygni	E W	...	19 33	...	42.90 49.75	43.40 49.15	27.112 26.588	175 20 12.02 184 28 12.10	+ 1.79 + 7.73	+ 0.32 - 0.32	- 4.57 + 4.57	+43 29 13.36
2	ζ Sagittæ	W E	...	19 44	...	49.40 43.30	49.10 43.75	30.953 31.709	159 50 9.62 199 52 10.55	+ 6.08 + 0.69	- 0.11 + 0.11	- 20.87 + 20.87	+18 53 42.61
3	63 Sagittarii	E W	...	19 50	...	43.20 50.05	43.60 49.60	25.340 26.000	232 44 6.62 127 5 57.88	+ 2.03 + 8.08	- 0.08 + 0.08	+ 15.41 - 15.41	-13 54 46.40
4	66 Aquilæ	W E	...	20 8	...	50.05 43.10	49.20 43.65	34.521 34.337	139 36 5.50 220 2 5.78	+ 6.43 + 0.55	+ 0.01 - 0.01	- 48.43 + 48.43	- 1 18 25.06
5	40 Cygni	W E	...	20 24	...	50.15 42.95	49.50 43.50	32.311 33.377	179 2 8.55 180 38 7.75	+ 6.62 + 0.41	- 0.26 + 0.26	- 0.81 + 0.80	+38 6 57.47
6	(7) Iris	W E	...	1 32	...	52.00 42.30	50.00 41.65	30.822 29.156	161 8 8.65 198 36 8.22	+ 8.08 - 0.41	- 0.12 + 0.12	- 10.55 + 19.55	+20 11 38.42
7	September 15, H. α Cygni	W E	...	20 38	...	48.35 43.50	48.25 44.15	30.228 29.619	185 52 9.75 173 52 8.85	+ 3.65 - 0.56	- 0.34 + 0.34	+ 6.01 - 6.01	+44 55 37.46
8	September 24, H. e Aquilæ	W E	...	19 25	...	47.50 44.05	47.25 44.25	32.702 33.152	137 56 5.72 221 44 8.40	+ 2.75 - 0.28	+ 0.02 - 0.02	- 49.91 + 49.92	- 2 59 42.10
9	14 Cygni	E W	...	19 36	...	43.75 47.15	44.40 47.35	32.543 33.057	176 10 9.92 183 30 10.10	+ 1.11 + 4.10	+ 0.31 - 0.31	- 3.57 + 3.57	+42 35 32.12
10	ρ Aquilæ	W E	...	20 10	...	47.10 43.65	47.40 44.40	31.147 28.651	155 50 11.05 203 54 9.40	+ 2.64 - 0.39	- 0.08 + 0.08	- 24.82 + 24.83	+14 53 45.20
11	40 Cygni	E W	...	20 24	...	43.60 47.40	44.45 46.95	33.167 32.342	180 38 10.80 179 2 9.35	+ 1.07 + 4.03	+ 0.26 - 0.26	+ 0.78 - 0.79	+38 6 59.68
12	α Cygni	W E	...	20 38	...	47.20 44.50	47.55 44.60	30.373 29.521	185 52 9.05 173 52 9.42	+ 2.77 + 0.09	- 0.34 + 0.34	+ 5.88 - 5.87	+44 55 40.89
13	September 26, H. α Cygni	W E	...	20 38	...	50.70 52.40	49.40 50.50	30.410 29.529	185 52 8.50 173 52 8.42	- 0.59 + 0.73	- 0.34 + 0.34	+ 6.00 - 6.00	+44 55 39.82
14	September 27, H. 8 Cygni	W E	...	19 28	...	51.05 51.60	49.40 49.90	32.079 30.441	175 10 10.58 184 32 15.62	- 0.14 + 0.35	- 0.22 + 0.22	- 4.70 + 4.70	+34 14 42.56
15	δ Cygni	E W	...	19 42	...	51.80 51.55	50.00 49.90	29.691 30.140	173 54 9.30 185 50 8.65	+ 1.06 + 1.79	+ 0.34 - 0.34	- 6.01 + 6.01	+44 53 31.22
16	63 Sagittarii	W E	...	19 50	...	51.55 51.00	49.70 49.45	26.051 25.316	127 6 2.22 232 44 5.35	+ 0.23 - 0.13	+ 0.08 - 0.08	- 15.63 + 15.65	-13 54 45.14
17	b ² Cygni	E W	...	20 6	...	51.50 51.95	49.80 49.50	27.236 28.440	182 16 8.65 177 30 53.55	+ 1.73 + 1.79	+ 0.25 - 0.25	+ 2.38 - 2.38	+36 33 1.23
18	176 B. Cygni	W E	...	20 17	...	51.95 51.20	50.00 49.45	33.216 35.379	180 0 11.00 179 38 8.42	+ 0.57 - 0.05	- 0.27 + 0.27	+ 0.17 - 0.17	+39 5 34.13
19	α Cygni	E W	...	20 38	...	51.20 52.70	49.50 50.50	29.489 30.336	173 52 8.85 185 52 8.88	+ 1.44 + 2.61	+ 0.34 - 0.34	- 6.06 + 6.07	+44 55 40.42

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
14 19 33	58.7	...	...	1, 3, 9, 11, 15, 17, 19. Observation at I.	1	179 55 32.36	-25.41
19 44	58.2	...	...		2	31.99	-22.15
19 50	57.9	...	...		3	34.66	-14.75
20 8	57.9	...	...		4	34.18	-19.14
20 23	57.9	...	...		5	31.97	-27.20
20 45	...	58.0	30.085		6	36.00	...
1 39	51.9	53.0	29.896		7	31.90	...
15 20 22	61.1	63.0	30.174		8	32.00	-15.30
24 19 16	69.3	71.0	29.898		9	31.14	-26.77
19 10	69.1	...	...		10	31.40	-23.76
20 9	68.8	...	...		11	29.28	-28.83
20 23	67.8	...	...		12	32.69	...
20 45	67.8	69.0	29.892	Notes.	13	31.47	...
26 20 20	53.7	56.0	29.680	4 E. One microscope reading decreased 10".	14	28.84	-25.26
27 19 17	54.6	54.5	29.925	6. Parallax 2".82.	15	31.57	...
19 42	53.2	...	...	10 W. Micrometer reading increased 1 rev.	16	31.70	-14.59
19 50	54.1	...	...		17	28.76	-28.12
20 5	53.9	...	...		18	29.64	-29.09
20 17	53.8	...	...		19	31.52	...
20 46	53.1	52.5	29.918				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	(7) Iris	W		1 27		53.00	51.00	30.865	161 0 8.35	+ 1.53	- 0.12	- 19.88	+20 3 38.45
	September 28, H.	E				50.55	48.85	29.051	198 44 7.42	- 0.63	+ 0.12	+ 19.88	
2	α Cygni	W		20 38		52.85	51.30	30.311	185 52 11.00	+ 2.07	- 0.34	+ 5.96	+44 55 40.34
		E				50.60	48.55	29.465	173 52 12.08	- 0.29	+ 0.34	- 5.96	
3	(7) Iris	W		1 26		53.25	51.05	29.661	160 58 10.45	+ 2.14	- 0.12	- 19.68	+20 0 52.18
	September 30, H.	E				50.40	48.60	30.100	198 46 10.95	- 0.35	+ 0.12	+ 19.68	
4	225 B. Draconis	W		19 28		50.70	48.90	30.598	220 20 5.75	- 0.05	- 0.29	+ 49.89	+79 24 29.30
		E				52.10	50.30	29.342	139 24 9.90	+ 1.27	+ 0.29	- 49.89	
5	α^1 Cygni	W		20 10		51.85	49.20	28.768	187 24 7.88	+ 0.19	- 0.36	+ 7.74	+46 26 35.50
		E				53.00	50.55	28.189	172 22 7.72	+ 1.37	+ 0.36	- 7.75	
6	69 Aquilæ	E		20 24		53.10	50.50	34.801	221 56 7.92	+ 2.85	- 0.02	+ 53.04	- 3 12 56.84
		W				52.25	49.65	33.864	137 42 5.75	+ 2.05	+ 0.02	- 53.04	
7	α Cygni	W		20 38		51.80	49.50	30.416	185 52 7.10	+ 0.31	- 0.34	+ 6.18	+44 55 40.00
		E				52.05	50.45	29.529	173 52 7.75	+ 1.15	+ 0.34	- 6.18	
8	f^1 Cygni	W		20 56		51.75	49.70	31.023	188 4 7.72	+ 0.38	- 0.36	+ 8.49	+47 8 7.48
		E				52.45	50.05	28.919	171 40 8.05	+ 0.87	+ 0.36	- 8.50	
9	γ Equulei	E		21 5		52.55	50.05	28.148	209 4 8.90	+ 2.38	+ 0.06	+ 32.89	+ 9 43 54.96
		W				52.60	50.55	31.630	150 40 8.68	+ 2.65	- 0.06	- 32.90	
10	1 Pegasi	W		21 17		52.50	50.10	32.738	160 18 6.40	+ 0.92	- 0.11	- 20.92	+19 22 48.94
		E				52.65	50.20	33.026	199 22 8.20	+ 1.03	+ 0.11	+ 20.91	
11	β Cephei	E		21 27		53.00	50.60	30.268	148 40 9.65	+ 2.85	+ 0.92	- 35.70	+70 7 35.06
		W				53.00	50.20	29.473	211 4 9.25	+ 2.66	- 0.92	+ 35.69	
12	(7) Iris	W		1 25		50.40	50.95	29.052	160 52 10.30	- 0.05	- 0.12	- 20.54	+19 54 24.44
	October 1, H.	E				49.05	50.25	30.787	198 52 9.88	- 0.73	+ 0.12	+ 20.53	
13	(7) Iris	W		1 24		51.85	52.50	29.529	160 48 8.52	+ 1.93	- 0.12	- 20.61	+10 50 44.18
	October 3, H.	E				48.95	49.85	30.325	198 56 8.80	- 0.68	+ 0.12	+ 20.61	
14	θ Cygni	W		19 34		47.00	53.25	30.230	190 56 8.75	+ 3.06	- 0.40	+ 11.43	+49 59 42.62
		E				43.05	49.50	29.630	168 48 7.30	+ 0.33	+ 0.40	- 11.43	
15	15 Vulpeculæ	E		19 57		42.00	48.85	33.073	191 16 10.45	+ 0.99	+ 0.18	+ 11.84	+27 28 55.22
		W				48.00	54.05	32.490	168 24 9.85	+ 6.27	- 0.18	- 11.84	
16	33 Cygni	W		20 11		48.00	53.95	27.609	197 14 8.58	+ 4.76	- 0.50	+ 18.29	+56 16 1.82
		E				42.65	49.60	29.318	162 32 8.90	+ 0.19	+ 0.50	- 18.29	
17	α Cygni	W		20 38		47.60	53.50	30.335	185 52 8.60	+ 4.35	- 0.34	+ 6.17	+44 55 41.02
		E				42.75	49.70	29.525	173 52 8.95	+ 0.29	+ 0.34	- 6.16	
18	(7) Iris	W		1 23		47.80	52.90	29.078	160 40 9.05	+ 3.27	- 0.12	- 20.66	+10 42 26.91
		E				43.45	48.95	30.832	199 4 6.02	- 0.63	+ 0.12	+ 20.66	

Time	Ther. (88)	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below					No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in.</i>								
27 1 20	48.9	49.0	29.984	Observation at VII.					1	179 55 10.80	
25 25 45	61.6	61.0	29.984	6.9.11.15. Observation at I.					2	12.04	
1 10	54.1	56.0	29.204						3	10.88	
15 19 17	48.1	49.5	30.086						4	11.30	-27.84
25 10	47.1								5	10.64	
25 24	46.9								6	10.18	-20.19
25 45	46.5	47.0	30.116						7	11.22	
25 16	45.9			Notes					8	11.60	-12.01
25 5	46.1			1 Parallax $1''$ 07					9	10.96	-26.40
25 17	46.1			2 Parallax $1''$ 14					10	10.14	
25 45	44.9	45.0	30.110	3 W One microscope reading decreased $10''$.					11	11.10	
1 13	39.9	41.0	30.144	6. Micrometer reading decreased 2 rev.					12	10.68	
1 1 10	41.2	42.0	30.204	12. Parallax $1''$ 18.					13	10.60	
1 19 17	50.1	51.0	30.161	11. Parallax $1''$ 20.					14	11.60	
19 12	49.4			18. Parallax $1''$ 25.					15	11.56	-26.24
25 11	49.1								16	12.65	-31.05
25 19		51.0	30.174						17	12.44	
25 18	48.8								18	11.20	
21 17		48.5	30.183								
1 10	47.4	43.5	30.148								

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
1	October 7, H. α Ursæ Minoris S. P.	E W	...	<i>h m s</i> 13 14 58.0 13 35 36.0	<i>m s</i> 8 39.3 11 58.7	<i>d</i> 48.10 49.65	<i>d</i> 47.35 48.95	<i>r</i>	<i>° ' "</i> 127 38 35.54 232 12 31.78	<i>"</i> - 0.29 + 1.19	<i>"</i> - 3.16 + 6.03	<i>' "</i> - 1 12.80 + 1 12.80	<i>° ' "</i> +88 46 26.94
2	October 9, H. α Ursæ Minoris S. P.	E W	...	13 19 4.0 13 31 54.0	4 35.0 8 15.0	47.35 47.65	47.35 48.20	..... .....	127 38 33.40 232 12 34.26	0.00 + 0.39	- 0.89 + 2.87	- 1 12.04 + 1 12.04	+88 46 28.66
3	8 Cygni	W E	...	19 28 .....	..... .....	46.50 49.90	47.15 50.40	32.151 30.646	175 10 10.28 184 32 9.20	- 0.59 + 2.55	- 0.22 + 0.22	- 4 61 + 4 62	+34 14 41.6
4	10 Vulpeculæ	E W	...	19 40 .....	..... .....	50.35 47.20	50.45 47.35	28.131 31.621	193 16 9.78 166 28 9.70	+ 4.24 + 1.29	+ 0.16 - 0.16	+ 13.43 - 13.43	+25 32 12.94
5	20 Vulpeculæ	W E	...	20 8 .....	..... .....	50.70 54.10	47.20 50.40	32.938 29.865	167 6 8.50 192 36 9.58	- 0.63 + 2.47	- 0.16 + 0.16	- 12.76 + 12.76	+26 11 4.54
6	69 Aquilæ	W E	...	20 24 .....	..... .....	50.80 54.00	47.10 50.30	33.897 34.949	137 42 6.18 221 56 6.60	- 0.63 + 2.38	+ 0.02 - 0.02	- 51.06 + 51.06	- 3 12 57.44
7	α Cygni	E W	...	20 38 .....	..... .....	54.75 51.10	50.50 47.45	29.424 30.399	173 52 8.58 185 52 9.38	+ 4.29 + 1.13	+ 0.34 - 0.34	- 5 95 + 5 95	+44 55 41.14
8	October 10, H. α Ursæ Minoris S. P.	W E	...	13 23 31.0 13 30 38.0	0 8.3 6 58.7	52.50 52.80	48.00 47.80	..... .....	232 12 35.61 127 38 34.06	+ 0.12 + 0.45	0.00 - 2.06	+ 1 11.85 - 1 11.85	+88 46 29.71
9	October 12, H. θ Cephei	W E	...	20 28 .....	..... .....	48.50 53.00	49.45 53.15	30.245 29.669	203 36 8.78 156 8 7.95	- 0.41 + 3.44	- 0.64 + 0.64	+ 24.62 - 24.61	+62 39 51.03
10	α Cygni	E W	...	20 38 .....	..... .....	52.85 49.65	53.15 49.40	29.364 30.452	173 52 10.65 185 52 8.38	+ 4.83 + 1.55	+ 0.34 - 0.34	- 5 89 + 5 89	+44 55 41.79
11	7 Aquarii	W E	...	20 51 .....	..... .....	49.10 52.55	49.75 53.05	34.578 34.290	130 50 4.28 228 48 6.15	0.00 + 3.19	+ 0.06 - 0.06	- 1 4 25 + 1 4 25	- 10 4 44.04
12	f ² Cygni	W E	...	21 3 .....	..... .....	49.05 52.90	49.70 52.45	32.448 33.280	188 10 10.12 171 30 8.12	- 0.04 + 3.06	- 0.36 + 0.36	+ 8.20 - 8.20	+47 15 7.11
13	October 13, H. α Cygni	W E	...	20 38 .....	..... .....	50.40 52.05	51.95 53.00	30.431 29.426	185 52 8.50 173 52 9.20	- 0.59 + 0.68	- 0.34 + 0.34	+ 5 90 - 5 90	+44 55 41.90
14	(7) Iris	W E	...	1 15 .....	..... .....	50.25 51.15	51.75 52.50	31.891 27.970	159 40 10.70 200 4 9.50	- 0.68 + 0.09	- 0.11 + 0.11	- 20.91 + 20.91	+18 44 19.57
15	October 14, H. α Ursæ Minoris S. P.	W E	...	13 20 6.0 13 27 18.0	3 34.6 3 37.4	51.45 50.40	52.60 51.05	..... .....	232 12 32.70 127 38 33.35	+ 1.48 + 0.26	+ 0.55 - 0.56	+ 1 12.28 - 1 12.28	+88 46 30.08
16	α Cygni	W E	...	20 38 .....	..... .....	51.00 51.60	51.55 53.05	30.424 29.360	185 52 10.28 173 52 10.48	+ 0.13 + 1.13	- 0.34 + 0.34	+ 5 94 - 5 94	+44 55 43.53
17	μ Aquarii	W E	...	20 47 .....	..... .....	50.75 50.95	51.90 52.80	33.481 32.317	131 34 7.30 228 6 9.45	+ 0.19 + 0.71	+ 0.05 - 0.05	- 1 3 19 + 1 3 19	- 9 21 23.90
18	ξ Cygni	E W	...	21 1 .....	..... .....	51.65 50.75	53.00 52.00	28.770 30.842	175 16 11.92 184 28 11.98	+ 2.59 + 1.69	+ 0.32 - 0.32	- 4 56 + 4 56	+43 32 2.92

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No.	Zenith point.	Red. to 1899.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				
7 13 25	62.5			1. Observation assumed as at VII with fixed thread.	1	179 55 35.54	
13 42		61.3	29.866	2. E. observation assumed as at VI; W. assumed as at VII with fixed thread.	2	35.02	
9 13 25	66.9			3. Observation at I.	3	32.00	-25.82
13 35		67.5	29.821	4. W. observation assumed as at V; E. assumed as at III with fixed thread.	4	31.61	-24.88
19 17	61.9			5. Observation assumed as at IV with fixed thread.	5	31.18	-25.10
19 40	61.9		29.848		6	32.04	-20.20
20 8	62.0				7	32.26	
20 24	61.1				8	34.09	
20 45	60.6	61.0	29.861		9	32.12	
10 13 27	71.8				10	33.13	
13 39		71.0	30.029		11	32.57	-20.00
12 20 17	67.9	69.0	29.986		12	31.77	-34.16
20 18	67.9				13	30.16	
20 51	68.3				14	31.14	
21 16	68.0	68.0	29.986	Notes.	15	33.89	
13 20 21	67.7	69.5	10 014	3. Poor.	16	30.78	
1 0	60.8	61.5	30 038	6, 11. Micrometer reading decreased 5 rev.	17	31.48	
14 11 24	70.4			14. Parallax 3".51.	18	30.35	-33.85
11 40		70.0	10 125				
20 16	66.0	68.0	10 098				
20 47	65.9						
21 1	64.9						

No	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Equulei	W		21 11		50.60	51.55	32.235	145 46 9.85	-0.05	-0.03	-38.23	+4 50 13.08
	October 18, H.	E				51.10	52.20	33.532	213 54 7.25	+0.49	+0.03	+38.23	
2	α Ursæ Minoris S. P.	W		13 20 18.0	3 34.1	51.45	52.80		232 12 32.88	+1.20	+0.54	+11.61	+88 46 31.53
	October 19, H.	E		13 27 42.0	3 49.9	50.25	51.85		127 38 34.94	+0.10	-0.63	-11.61	
3	ω^1 Cygni	W		20 27		40.85	52.10	32.645	180 32 9.75	-0.41	-0.38	+9.62	+48 37 16.57
		E				51.20	53.00	33.082	170 8 9.80	+0.64	+0.38	-9.62	
4	α Cygni	E		20 38		51.70	53.20	29.275	173 52 12.08	+2.43	+0.34	-5.93	+44 55 43.06
		W				50.40	52.05	30.387	185 52 10.95	+1.27	-0.34	+5.93	
5	γ^6 Draconis	W		20 50		50.25	51.65	29.780	223 6 7.52	-0.01	-0.39	+52.86	+82 10 2.22
		E				51.25	52.85	30.089	136 38 7.98	+1.03	+0.39	-52.86	
6	β Aquarii	W		21 4		50.35	51.70	31.943	120 10 8.38	-0.38	+0.07	-11.69	-11 46 31.06
		E				51.10	52.60	30.995	230 32 4.80	+0.41	-0.07	+11.69	
7	γ Cygni	E		21 14		51.25	52.95	30.304	184 18 7.88	+2.09	+0.23	+4.38	+34 28 55.24
		W				51.05	52.50	29.497	175 26 7.25	+1.79	-0.23	-4.38	
8	ρ Cygni	W		21 30		50.60	52.05	32.882	186 4 6.22	-0.09	-0.34	+6.16	+45 9 18.44
		E				51.00	52.70	33.039	173 36 7.68	+0.40	+0.34	-6.16	
9	η Cephei	E		21 40		51.40	53.30	27.613	147 58 8.12	+2.33	+0.96	-35.14	+70 51 23.56
		W				50.85	52.25	29.225	211 48 8.22	+1.57	-0.96	+35.14	
10	δ Aquarii	W		21 56		50.80	52.75	34.592	141 2 5.05	+0.33	0.00	-45.31	+0 7 38.40
		E				51.10	52.95	34.185	218 36 8.20	+0.57	0.00	+45.31	
11	ζ Cephei	E		22 7		51.60	53.20	28.199	161 6 9.52	+2.38	+0.53	-19.23	+57 42 48.45
		W				51.00	52.40	31.773	198 38 10.15	+1.71	-0.53	+19.23	
12	γ^7 Iris	W		1 11		51.80	53.15	32.208	158 54 10.00	+0.99	-0.11	-21.74	+17 58 32.72
		E				50.95	52.35	27.639	200 50 9.12	+0.21	+0.11	+21.74	
13	α Ursæ Minoris	E		1 20 17.0	3 36.2	50.50	51.60		130 5 28.15	+0.51	+0.55	-11.70	+88 46 30.23
	October 20, H.	W		1 27 0.0	3 12.8	51.50	53.05		229 45 40.42	+1.07	-0.44	+11.72	
14	δ^1 Cygni	W		20 25		51.60	51.10	31.831	170 58 6.82	-0.56	-0.19	-9.03	+30 2 21.69
		E				52.70	53.15	31.003	188 44 10.95	+0.93	+0.19	+9.03	
15	α Cygni	E		20 38		53.95	53.20	29.243	173 52 12.82	+2.99	+0.34	-6.09	+44 55 44.22
		W				53.40	52.00	30.450	185 52 7.72	+2.16	-0.34	+6.09	
16	θ^6 Cygni	W		21 22		52.55	52.05	31.669	177 10 9.35	+0.33	-0.24	-2.72	+36 14 25.40
		E				54.00	53.10	31.078	182 32 9.18	+1.51	+0.24	+2.72	
17	γ^4 Cygni	E		21 33		54.40	53.25	37.337	178 44 10.20	+3.23	+0.28	-1.06	+30 58 0.50
		W				54.05	52.55	30.935	180 50 10.95	+2.73	-0.28	+1.06	
18	η Cephei	W		21 51		53.45	52.35	31.458	197 4 9.30	+0.89	-0.50	+18.01	+56 8 36.74
		E				54.20	53.10	31.282	162 38 10.92	+1.60	+0.50	-18.01	
19	α Ursæ Minoris S. P.	W		13 20 38.0	3 18.4	54.45	53.15		232 12 25.90	+2.40	+0.46	+11.52	+88 46 33.29
		E		13 31 18.0	7 21.6	51.90	51.20		127 38 41.42	+0.43	-2.29	-11.50	

Time	Ther- mos.	Att. ther.	Barom.	Observation made at IX with movable thread except as noted below	No	Zenith point	Red. to 15000
10 30 39	51.5	51.5	30.101	Observation assumed as at IV with fixed thread	1	179 55	10.70
10 31 18	51.9	51.9	30.101	Observation at I.	2	180 40	14.40
10 32 00	52.1	52.1	30.099	Observation assumed as at VII.	3	181 01	18.93
10 32 38	52.2	52.2	29.974	W observation assumed as at IV. E assumed as at III with fixed thread.	4	180 66	
10 33 18	52.5	52.5	29.974		5	180 36	
10 34 00	52.7	52.7	29.974		6	180 36	
10 34 42	53.0	53.0	29.974		7	180 62	11.38
10 35 24	53.1	53.1	29.974		8	181 18	16.69
10 36 06	53.2	53.2	29.974		9	181 12	
10 36 48	53.3	53.3	29.974		10	181 12	26.86
10 37 30	53.4	53.4	29.974		11	181 40	
10 38 12	53.5	53.5	29.974		12	181 20	
10 38 54	53.6	53.6	29.974		13	181 44	
10 39 36	53.7	53.7	29.974		14	181 11	29.64
10 40 18	53.8	53.8	29.974		15	181 26	
10 41 00	53.9	53.9	29.974		16	181 45	34.14
10 41 42	54.0	54.0	29.974		17	182 12	
10 42 24	54.1	54.1	29.974		18	182 48	47.88
10 43 06	54.2	54.2	29.974		19	183 17	

Notes

Micrometer reading decreased 0.05

Parallax 0.00

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
	October 21, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Cygni	W	...	20 38	...	53. 10	50. 25	30. 389	185 52 9. 88	+ 0. 77	- 0. 34	+ 6. 22	+44 55 42. 62
		E	...		...	52. 95	49. 55	29. 413	173 52 10. 28	+ 0. 36	+ 0. 34	- 6. 21	
2	76 Draconis	E	...	20 50	...	53. 45	49. 30	30. 152	136 38 8. 42	+ 1. 49	+ 0. 39	- 55. 52	+82 10 2. 26
		W	...		...	53. 25	49. 60	29. 589	223 6 12. 00	+ 1. 54	- 0. 39	+ 55. 52	
3	61 Cygni (1st star)	W	...	21 2	...	53. 70	49. 45	30. 608	179 12 11. 18	+ 0. 66	- 0. 26	- 0. 68	+38 15 46. 04
		E	...		...	52. 90	49. 20	29. 110	180 32 12. 48	+ 0. 17	+ 0. 26	+ 0. 68	
4	α Equulei	W	...	21 11	...	54. 35	50. 05	32. 199	145 46 13. 62	+ 1. 25	- 0. 03	- 39. 96	+ 4 50 13. 68
		E	...		...	53. 35	49. 45	30. 443	213 56 12. 32	+ 0. 50	+ 0. 03	+ 39. 96	
5	358 B. Cygni	W	...	21 28	...	54. 60	49. 70	29. 181	193 8 11. 20	+ 1. 19	- 0. 43	+ 13. 94	+52 11 2. 78
		E	...		...	53. 40	49. 15	30. 552	166 36 11. 10	+ 0. 37	+ 0. 43	- 13. 94	
6	κ Pegasi	E	...	21 40	...	53. 45	48. 85	26. 333	193 38 11. 80	+ 1. 71	+ 0. 16	+ 14. 45	+25 11 23. 17
		W	...		...	54. 05	49. 60	27. 374	166 10 10. 32	+ 2. 63	- 0. 16	- 14. 45	
7	Bradley 2868	W	...	21 50	...	54. 40	49. 65	31. 719	196 40 9. 25	+ 1. 08	- 0. 50	+ 17. 89	+55 44 47. 40
		E	...		...	53. 15	49. 20	31. 068	163 2 10. 22	+ 0. 29	+ 0. 50	- 17. 89	
8	ν Pegasi	E	...	22 1	...	53. 60	49. 55	27. 320	214 14 9. 62	+ 2. 12	+ 0. 03	+ 40. 43	+ 4 34 23. 10
		W	...		...	54. 95	50. 25	25. 415	145 28 12. 18	+ 3. 08	- 0. 03	- 40. 43	
9	(7) Iris	W	...	1 9	...	53. 85	49. 40	31. 349	158 38 12. 02	+ 0. 71	- 0. 11	- 23. 19	+17 41 58. 52
		E	...		...	52. 90	49. 30	28. 342	201 6 12. 68	+ 0. 21	+ 0. 11	+ 23. 19	
10	α Ursæ Minoris	E	...	1 28 16. 0	4 21. 5	52. 10	49. 20	...	130 5 29. 74	+ 0. 39	+ 0. 81	- 1 10. 63	+88 46 31. 40
		W	...	1 37 44. 0	13 49. 5	53. 50	50. 80	...	229 45 44. 64	+ 2. 23	- 8. 02	+ 1 10. 66	
11	October 24, H. α Cygni	W	...	20 38	...	48. 40	48. 10	30. 450	185 52 7. 42	+ 1. 87	- 0. 34	+ 5. 96	+44 55 43. 46
		E	...		...	46. 95	46. 50	29. 447	173 52 7. 75	+ 0. 43	+ 0. 34	- 5. 96	
12	76 Draconis	E	...	20 50	...	46. 75	46. 40	30. 058	136 38 9. 55	+ 1. 30	+ 0. 39	- 53. 27	+82 10 2. 78
		W	...		...	48. 65	48. 45	29. 690	223 6 8. 90	+ 3. 17	- 0. 39	+ 53. 27	
13	61 Cygni (1st star)	W	...	21 2	...	48. 55	48. 10	30. 573	179 12 10. 08	+ 1. 93	- 0. 26	- 0. 65	+38 15 45. 51
		E	...		...	46. 50	46. 70	29. 170	180 32 9. 75	+ 0. 31	+ 0. 26	+ 0. 65	
14	α Cephei	E	...	21 16	...	46. 55	46. 85	29. 258	156 38 10. 08	+ 1. 87	+ 0. 63	- 24. 36	+62 10 4. 88
		W	...		...	48. 95	48. 35	30. 440	203 6 8. 68	+ 3. 70	- 0. 63	+ 24. 36	
15	74 Cygni	W	...	21 33	...	48. 60	48. 30	31. 162	180 54 9. 08	+ 2. 05	- 0. 28	+ 1. 04	+39 58 10. 90
		E	...		...	46. 05	46. 30	28. 590	178 50 9. 55	- 0. 09	+ 0. 28	- 1. 04	
16	ν Cephei	E	...	21 43	...	46. 40	46. 45	29. 502	158 8 8. 82	+ 1. 61	+ 0. 59	- 22. 66	+60 39 54. 18
		W	...		...	48. 70	48. 90	30. 171	201 36 9. 88	+ 3. 85	- 0. 59	+ 22. 66	
17	20 Pegasi	W	...	21 56	...	49. 45	49. 00	32. 618	153 34 7. 12	+ 2. 78	- 0. 07	- 28. 04	+12 38 39. 98
		E	...		...	46. 40	46. 45	33. 124	206 6 6. 48	+ 0. 15	+ 0. 07	+ 28. 05	
18	31 Pegasi	W	...	22 16	...	49. 75	49. 20	32. 058	152 38 8. 48	+ 3. 01	- 0. 07	- 29. 21	+11 42 16. 82
		E	...		...	46. 05	46. 25	30. 696	207 4 8. 62	- 0. 11	+ 0. 07	+ 29. 21	
19	30 Cephei	E	...	22 35	...	47. 15	46. 90	29. 107	155 44 10. 52	+ 2. 17	+ 0. 66	- 25. 55	+63 4 12. 30
		W	...		...	50. 10	49. 20	30. 561	204 0 9. 90	+ 4. 64	- 0. 66	+ 25. 55	
20	γ Piscium	W	...	23 12	...	50. 10	49. 45	32. 370	143 40 10. 08	+ 3. 30	- 0. 02	- 41. 71	+ 2 44 18. 76
		E	...		...	46. 05	46. 50	33. 272	216 0 9. 15	+ 0. 01	+ 0. 02	+ 41. 71	

Time	Ther. 1882	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.										No.	Zenith point.	Red. to 1890.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m.</i>												<i>° ' "</i>	<i>"</i>	
21 20 19	45. 9	48. 0	30. 228	1.	Observation assumed as at III.										1	179 55 30. 80	
20 50	45. 4			6, 8 E, 14, 16, 19.	Observation at I.										2	30. 62	
21 2	45. 9			8 W.	Observation on Z. D. thread B.										3	30. 66	
21 11	45. 3			10.	E. observation assumed as at VI; W. assumed as at III with fixed thread.										4	31. 96	
21 19	44. 9	46. 5	30. 228	12.	Observation at III.										5	30. 66	-36. 68
21 40	44. 9														6	28. 93	-32. 78
21 50	45. 0														7	31. 50	-37. 53
22 15	44. 6	45. 5	30. 240												8	33. 25	-28. 37
0 59	40. 6	42. 5	30. 244												9	30. 60	
1 31	40. 9														10	34. 91	
1 49		41. 5	30. 256												11	30. 82	
24 20 22	66. 1	66. 5	30. 224												12	30. 49	
20 50	65. 8														13	29. 97	
21 2	65. 8														14	30. 18	
21 24	65. 4	65. 5	30. 231	9.	Parallax 1" 20.										15	29. 40	
21 33	65. 3			17 E.	One microscope reading decreased 10".										16	29. 58	-38. 20
21 42	64. 9														17	29. 68	-30. 53
21 56	64. 7														18	30. 40	-30. 09
22 16	64. 1														19	31. 01	-38. 67
22 24	63. 1	63. 5	30. 211												20	30. 64	
23 24	62. 5	62. 5	30. 227														

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>''</i>	<i>° ' ''</i>	<i>''</i>	<i>''</i>	<i>' ''</i>	<i>° ' ''</i>
1	(7) Iris	W E		1 7	....	49.30 45.70	49.25 46.15	31.812 27.880	158 12 11.82 201 32 11.30	- 2.83 - 0.33	- 0.10 + 0.10	- 22.80 + 22.81	+17 10 19.78
2	α Ursæ Minoris	W E		1 20 1 30	51.0 1.0	50.90 45.60	50.00 45.70		229 45 36.82 130 5 27.66	- 4.52 0.00	- 0.44 + 1.49	+1 8.01 -1 8.00	+88 46 30.68
3	α Cygni	W E		20 38		49.00 45.85	48.55 45.65	30.400 29.414	185 52 9.95 173 52 8.80	- 2.17 - 0.68	- 0.34 + 0.34	+ 5.97 - 5.97	+44 55 44.50
4	α Cygni	W E		20 38		48.45 45.50	48.05 45.55	30.432 29.391	185 52 10.85 173 52 11.65	+ 2.53 - 0.05	- 0.34 + 0.34	+ 5.89 - 5.89	+44 55 44.50
5	β Vulpeculæ	E W		20 50		45.60 49.10	45.25 48.10	27.142 32.395	191 8 12.45 168 36 13.65	+ 1.32 + 4.31	+ 0.18 - 0.18	+ 11.14 - 11.14	+27 40 54.84
6	γ Cygni	W E		21 3		48.50 45.00	47.65 45.35	32.432 33.285	188 10 9.02 171 30 8.60	+ 2.35 - 0.37	- 0.36 + 0.36	+ 8.21 - 8.21	+47 15 8.80
7	ν Cygni	E W		21 14		45.35 48.95	45.35 48.10	30.260 29.411	184 18 10.55 175 26 10.32	+ 1.25 + 4.24	+ 0.23 - 0.23	+ 4.35 - 4.35	+34 28 56.26
8	α Cygni	W E		20 38		46.70 49.85	51.25 54.35	30.453 29.432	185 52 9.38 173 52 9.58	- 0.04 + 2.91	- 0.34 + 0.34	+ 6.16 - 6.16	+44 55 41.88
9	δ H ¹ . Cassiopeiæ	W E		23 8		40.15 50.50	51.00 55.00	32.582 33.138	197 32 7.05 162 8 9.10	- 0.41 + 3.51	- 0.51 + 0.51	+ 18.88 - 18.88	+56 37 21.14
10	γ Pegasi	W E		23 29		47.05 50.75	51.05 54.80	32.235 27.642	171 42 10.38 188 2 5.40	+ 0.02 + 3.53	- 0.20 + 0.20	- 8.47 + 8.47	+30 46 42.64
11	ϕ Andromedæ	E W		23 41		51.25 46.40	54.55 50.65	28.580 31.181	172 56 9.02 186 48 9.90	+ 5.11 + 0.09	+ 0.35 - 0.35	- 7.22 + 7.22	+45 52 14.70
12	δ Piscium	W E		0 15		47.00 50.55	51.40 54.45	32.305 30.468	148 34 8.70 211 8 9.32	+ 0.17 + 3.27	- 0.04 + 0.04	- 36.01 + 36.01	+ 7 38 16.39
13	κ Cassiopeiæ	E W		0 27		50.90 46.70	54.60 50.90	27.693 29.107	156 26 10.82 203 20 9.25	+ 4.97 + 1.25	+ 0.64 - 0.64	- 25.74 + 25.74	+62 23 8.13
14	(7) Iris	W E		0 59		47.10 50.45	51.40 54.55	31.895 30.974	154 14 7.50 205 28 7.12	+ 0.21 + 3.27	- 0.07 + 0.07	- 28.45 + 28.45	+13 18 9.58
15	α Ursæ Minoris	E W		1 22 1 31	23.0 56.0	49.65 47.65	53.90 52.00		130 5 16.40 229 45 52.39	+ 3.46 + 1.78	+ 0.05 - 2.99	-1 10.34 +1 10.34	+88 46 42.78
16	α Cygni	W E		20 38		49.65 48.85	50.05 48.90	30.361 29.441	185 52 8.42 173 52 9.92	+ 0.59 - 0.33	- 0.34 + 0.34	+ 6.05 - 6.05	+44 55 41.01
17	β Pegasi	W E		22 59		48.65 48.85	49.55 50.20	32.191 30.422	168 28 10.92 191 14 9.85	- 0.11 + 0.29	- 0.18 + 0.18	- 11.72 + 11.72	+27 32 41.34
18	γ Andromedæ	E W		23 15		49.00 49.25	50.15 50.10	28.656 31.061	177 16 8.48 182 28 8.42	+ 1.79 + 1.80	+ 0.30 - 0.30	- 2.67 + 2.67	+41 32 8.30

Time	Ther. (88°)	Att. ther.	Barom	Observation made at IX with movable thread, except as noted below.	No	Zenith point	Red. to 1899.0.
<i>h m s</i>	<i>° ' ''</i>	<i>° ' ''</i>	<i>in</i>			<i>° ' ''</i>	<i>° ' ''</i>
24 5 13	59.1	60.0	30.224	Observation assumed as at VI with fixed thread	1	179 55 10.0	
1 27	58.9			Observation at I	2	15 03	
1 33		59.9	30.216	Observation at I	3	10.50	
22 25 26	64.1	61.0	30.167	E. observation assumed as at IV. W. assumed as at III with fixed thread	4	11.06	
25 36 17	68.8	69.5	30.921		5	10.60	
26 36	68.1				6	10.72	13.15
26 3	68.0				7	10.64	13.24
21 22	67.8	67.5	30.901		8	10.76	
24 25 15	44.7	43.5	29.556		9	10.90	
24 53	39.4	40.5	29.575		10	11.12	17.48
24 29	39.2				11	12.26	10.69
24 47	35.9				12	11.02	10.15
24 51		39.5	29.577		13	11.98	10.90
6 27	31.9			Notes.	14	11.81	
1 39	37.9	37.9	29.586	1. Parallax 1" 55	15	13.64	
1 77	37.4			14. Parallax 1" 54	16	29.11	
1 31		36.5	29.582		17	28.00	
22 5 20	49.1	50.1	29.619		18	28.68	-49.02
24 47	49.9	44.6	29.647				
23 15	49.6						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 H. Cassiopeiæ	W E	...	23 25 ...	...	49.00 49.00	49.80 49.85	30.009 29.071	108 56 3.42 160 48 4.42	+ 0.17 + 0.19	- 0.53 + 0.53	+ 20.19 - 20.20	+58 0 13.48
2	κ Andromedæ	E W	...	23 35 ...	...	48.95 49.75	49.75 50.40	27.201 26.608	175 2 9.05 184 46 8.15	+ 1.58 + 2.26	+ 0.32 - 0.32	- 4.97 + 4.97	+43 47 9.24
3	35 Piscium	W E	...	0 10 ...	...	48.95 48.50	49.85 49.85	32.022 30.888	149 12 5.58 210 30 4.75	+ 0.17 - 0.05	- 0.04 + 0.04	- 34.58 + 34.58	+ 8 16 5.80
4	10 Ceti	W E	...	0 21 ...	...	49.05 48.40	50.00 49.35	32.043 30.771	140 20 7.02 219 22 6.78	+ 0.29 - 0.33	+ 0.01 - 0.01	- 48.14 + 48.14	- 0 36 4.94
5	ζ Cassiopeiæ	E W	...	0 31 ...	...	49.00 49.00	50.05 49.95	27.578 29.312	165 28 7.45 194 18 6.30	+ 1.75 + 1.69	+ 0.45 - 0.45	- 15.05 + 15.05	+53 21 6.20
6	(7) Iris	W E	...	1 0 ...	...	48.95 48.45	50.10 49.60	31.813 28.291	154 0 4.32 205 43 58.58	+ 0.29 - 0.19	- 0.07 + 0.07	- 28.33 + 28.33	+13 4 7.20
7	α Ursæ Minoris	W E	...	1 20 20.0 1 29 18.0	3 7.9 5 50.1	49.95 48.50	50.90 49.35	..... .....	229 45 48.80 130 5 16.01	+ 1.72 + 0.30	- 0.42 + 1.44	+1 9.33 -1 9.33	+88 46 42.55
8	November 30, H α Ursæ Minoris S. P.	W E	...	13 19 2.0 13 29 2.0	4 25.0 5 35.0	53.45 54.40	50.95 51.80	..... .....	232 12 13.26 127 38 50.59	+ 0.16 + 1.17	+ 0.83 - 1.32	+1 14.18 -1 14.18	+88 46 47.12
9	December 2, H. α Cygni	W E	...	20 38 ...	...	53.95 54.05	51.95 51.90	30.378 29.424	185 52 7.72 173 52 8.92	- 0.23 + 0.92	- 0.34 + 0.34	+ 5.95 - 5.95	+44 55 40.71
10	λ Piscium	W E	...	23 37 ...	...	53.95 54.75	50.55 52.35	31.981 30.838	142 10 7.18 217 32 6.80	- 0.47 + 1.19	0.00 0.00	- 44.42 + 44.42	+ 1 13 55.08
11	φ Pegasi	E W	...	23 47 ...	...	55.60 53.65	53.95 50.50	28.075 31.599	200 14 7.30 159 30 10.22	+ 3.37 + 1.25	+ 0.11 - 0.11	+ 21.37 - 21.37	+18 34 7.67
12	30 Piscium	W E	...	23 57 ...	...	53.55 55.25	50.15 52.50	32.371 33.373	134 22 5.05 225 18 8.45	- 0.43 + 1.49	+ 0.03 - 0.03	- 58.53 + 58.53	- 6 34 4.82
13	318 B. Cephei	E W	...	0 11 ...	...	55.25 53.55	52.20 50.35	29.753 29.981	142 24 6.60 217 20 7.68	+ 2.80 + 1.13	+ 1.38 - 1.38	- 44.19 + 44.19	+76 24 3.08
14	13 Ceti	W E	...	0 30 ...	...	53.30 55.00	50.60 52.45	31.548 31.329	136 48 7.25 222 54 3.55	- 0.33 + 1.35	+ 0.02 - 0.02	- 53.86 + 53.86	- 4 8 31.56
15	η Cassiopeiæ	E W	...	0 43 ...	...	56.00 54.15	52.70 51.35	27.115 26.797	161 32 6.25 198 16 6.15	+ 3.39 + 1.89	+ 0.51 - 0.51	- 19.18 + 19.17	+57 17 28.10
16	α Ursæ Minoris	W E	...	1 20 20.0 1 30 13.0	3 7.3 6 45.7	54.50 53.55	51.90 50.95	..... .....	229 45 52.01 130 5 11.15	+ 1.44 + 0.54	- 0.42 + 1.03	+1 8.47 -1 8.47	+88 46 44.98
17	α Trianguli	E W	...	1 47 ...	...	54.35 54.45	51.85 51.90	28.041 30.812	189 42 9.30 170 2 7.72	+ 2.22 + 2.29	+ 0.18 - 0.18	+ 10.02 - 10.02	+29 5 44.05
18	α Arietis	W E	...	2 2 ...	...	54.10 54.40	51.35 52.10	30.757 29.041	163 56 8.08 195 48 7.72	+ 0.40 + 0.01	- 0.14 + 0.14	- 16.52 + 16.52	+22 59 35.11

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No	Zenith point.	Red. to 1899 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>°</i>	
27 23 25	42.0	...	...	2, 5, 11, 13, 15, 17. Observation at I.	1	179 55 27.86	-42.60
23 35	41.9	...	...	7.16. Observation assumed as at VI with fixed thread.	2	28.30	-40.10
23 45	41.9	42.0	29.644	8. W. observation assumed as at IV; E. assumed as at III with fixed thread	3	28.82	-30.41
0 22	41.7	...	...		4	28.52	-27.47
0 31	41.1	...	...		5	29.28	...
0 45	41.0	41.0	29.638		6	27.80	...
1 25	40.2	...	...		7	33.97	...
1 41	...	40.5	29.641		8	32.34	...
30 13 10	...	45.0	29.487		9	28.81	...
13 24	47.0	...	...		10	29.09	-28.05
2 20 25	55.0	55.0	29.511		11	28.60	...
23 20	46.8	47.0	29.516		12	28.74	...
23 47	46.1	...	...		13	27.84	-45.85
23 50	46.1	...	...		14	28.84	...
0 20	45.5	45.5	29.506		15	28.72	-30.70
0 30	45.4	...	...		16	33.32	...
0 43	44.9	...	...		17	29.89	...
1 10	...	45.0	29.506*		18	28.60	...
1 25	44.1	...	...		
1 47	44.1	...	...		
2 12	44.2	44.0	29.523				

Notes.

6 Parallax 3".78.

11 W. One level reading decreased 5 div.

12 E. One microscope reading decreased 10".

14 W. Micrometer reading increased 1 rev

* Barometer reading changed from 29.956 to 29.506 in.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	December 4, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	α Cygni	W	E	20 38		53.90	51.80	30.383	185 52 7.78	- 0.59	- 0.34	+ 0.21	+44 55 40.84
	December 5, H.					55.20	52.55	29.485	173 52 7.15	+ 0.37	+ 0.34	- 0.21	
2	α Cygni	W	E	20 38		40.20	46.55	30.321	185 52 9.02	- 0.73	- 0.34	+ 0.21	+44 55 39.24
	December 6, H.					46.05	47.00	29.440	173 52 11.42	- 0.31	+ 0.34	- 0.21	
3	α Cygni	W	E	20 38		48.60	46.85	30.400	185 52 6.35	- 0.71	- 0.34	+ 0.20	+44 55 40.27
	December 8, H.					50.10	48.50	29.461	173 52 8.35	+ 0.78	+ 0.34	- 0.20	
4	α Cygni	W	E	20 38		49.55	44.70	30.338	185 52 7.15	- 0.61	- 0.34	+ 0.10	+44 55 38.43
	December 9, H.					49.45	44.55	29.449	173 52 11.82	- 0.73	+ 0.34	- 0.10	
5	α Cygni	W	E	20 38		50.00	44.55	30.401	185 52 6.10	- 0.57	- 0.34	+ 0.14	+44 55 40.44
	December 12, H.					49.75	44.90	29.512	173 52 6.65	- 0.51	+ 0.34	- 0.14	
6	α Cygni	W	E	20 38		51.95	49.65	30.278	185 52 12.02	- 0.03	- 0.34	+ 5.85	+44 55 41.21
						51.55	49.05	29.431	173 52 8.98	- 0.22	+ 0.34	- 5.85	
7	ρ Andromedæ	W	E	0 16		50.50	50.10	32.719	178 20 10.02	- 0.49	- 0.25	- 1.49	+37 25 11.45
						52.50	52.00	32.891	181 20 8.35	+ 1.35	+ 0.25	+ 1.49	
8	ϵ Andromedæ	E	W	0 33		52.45	51.05	27.951	190 2 7.22	+ 2.61	+ 0.18	+ 10.17	+28 46 23.85
						51.25	50.50	28.793	169 44 8.75	+ 1.51	- 0.18	- 10.17	
9	ν Andromedæ	W	E	0 44		51.05	50.35	31.440	181 28 6.12	- 0.12	- 0.29	+ 1.60	+40 32 21.17
						52.05	51.45	31.280	178 14 5.88	+ 0.87	+ 0.29	- 1.60	
10	ϵ Piscium	E	W	0 58		51.70	51.15	29.060	211 26 6.82	+ 2.03	+ 0.04	+ 34.88	+ 7 21 14.03
						51.50	50.85	30.698	148 18 5.70	+ 1.79	- 0.04	- 34.89	
11	ν Piscium	W	E	1 14		51.00	50.65	32.020	167 40 9.25	+ 0.01	- 0.17	- 12.26	+26 44 32.34
						51.85	51.35	30.672	102 2 7.62	+ 0.73	+ 0.17	+ 12.26	
12	α Ursæ Minoris	E	W	1 22 30.0	0 53.0	51.00	50.40		130 5 8.48	+ 0.76	+ 0.03	- 7.33	+88 46 47.57
				1 28 3.0	4 40.0	51.70	51.40		229 45 55.55	+ 1.56	- 0.93	+ 7.33	
13	σ Piscium	W	E	1 40		51.95	51.25	30.898	149 30 8.72	+ 0.73	- 0.05	- 33.21	+ 8 39 25.00
						52.05	51.45	28.825	210 8 10.28	+ 0.87	+ 0.05	+ 33.21	
14	ν Ceti	W	E	2 31		52.30	51.65	34.141	146 4 6.85	+ 1.09	- 0.03	- 38.26	+ 5 9 31.03
						52.00	51.55	34.506	213 34 7.05	+ 0.90	+ 0.03	+ 38.26	
15	γ Arietis	E	W	2 42		52.05	51.85	28.305	189 58 7.98	+ 2.53	+ 0.18	+ 10.20	+28 50 6.25
						53.00	52.30	28.291	169 48 10.02	+ 3.19	- 0.18	- 10.20	
16	λ Ceti	W	E	2 54		52.90	51.95	32.688	149 26 7.90	+ 1.51	- 0.05	- 33.64	+ 8 30 37.53
	December 13, H.					51.00	51.30	32.930	210 14 9.95	+ 0.73	+ 0.05	+ 33.64	
17	α Cygni	W	E	20 38		50.15	51.00	30.223	185 52 8.75	+ 3.91	+ 0.34	+ 5.09	+44 55 39.26
						44.95	46.85	29.540	173 52 7.40	- 0.49	+ 0.34	- 5.09	

Time	Ther. 1892.	Att. ther.	Barom.	Observation made at IX with movable thread, except as noted below.	No	Zenith point.	Red. to 1899 0.
1 20 31	42.0	45.5	29.954	8. 10. 15. Observation at I.	1	179 55 28.85	
1 26 34	46.1	40.5	29.873	17 Observation assumed as at IV with fixed thread	2	29.00	
1 32 37	42.2	44.0	29.939		3	28.91	
1 38 40	50.9	51.5	29.993		4	28.66	
1 44 43	49.4	49.5	30.058		5	28.24	
1 50 46	65.4	66.5	29.926		6	28.62	
1 56 49	56.9	56.5	29.678		7	28.34	38.54
2 02 52	56.9				8	27.74	
2 08 55	56.2				9	26.28	
2 14 58	56.9	55.0	29.628		10	27.40	
2 20 59	56.0				11	27.95	
2 26 59	56.3				12	27.52	
2 32 59	54.9			Note	13	28.82	
2 38 59	54.3	51.0	29.701	1 E. One level reading decreased 0.12	14	28.68	
2 44 59	52.2				15	27.77	-26.80
2 50 59	51.8				16	28.94	-20.31
2 56 59	51.0		29.721		17	29.11	
3 02 59	56.9	57.5	29.715				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	May 15, H. β Crateris	W E	...	11 3 15.0 11 10 53.0	3 43.4 3 54.6	41.45 44.30	46.55 48.95	...	118 44 18.22 241 7 48.42	+ 0.26 + 2.74	+ 22.35 - 24.65	-1 42.62 +1 42.63	-22 17 48.64
2	Leonis	E W	...	11 21 59.0 11 29 35.0	3 27.6 4 8.4	45.85 45.00	50.45 48.60	...	221 18 55.72 138 32 52.26	+ 4.18 + 2.89	- 27.64 + 39.57	+ 49.97 - 49.97	- 2 28 1.92
3	May 17, H. 44 H. Cephei S. P.	E W	...	12 59 37.0 13 7 40.0	4 16.5 3 46.5	59.50 56.60	56.55 54.60	...	118 2 8.68 241 49 53.92	+ 4.57 + 2.30	- 5.96 + 4.64	-1 43.11 +1 43.11	+79 9 3.30
4	ζ Virginis	W E	...	13 25 35.0 13 34 33.0	4 15.8 4 42.2	55.50 61.00	53.20 58.20	...	140 54 54.91 218 57 17.06	+ 1.11 + 6.06	+ 44.10 - 53.67	- 44.86 + 44.87	- 0 5 52.72
5	γ Boötis	E W	...	13 45 57.0 13 55 52.0	4 12.8 5 42.2	60.60 57.05	57.60 54.50	...	199 58 58.91 159 52 3.90	+ 5.58 + 2.45	-1 14.84 +2 17.10	+ 20.25 - 20.26	+18 53 13.45
6	Virginis	W E	...	14 7 6.0 14 14 37.0	3 55.5 3 35.5	57.75 61.05	55.10 58.00	...	135 28 57.31 224 23 0.08	+ 3.06 + 5.98	+ 33.44 - 28.00	- 54.44 + 54.44	- 5 32 9.75
7	π Boötis	E W	...	14 31 53.0 14 39 50.0	4 23.1 3 33.9	61.05 58.15	58.65 55.50	...	202 1 57.30 157 50 29.52	+ 6.30 + 3.44	-1 14.71 + 49.43	+ 22.58 - 22.56	+16 50 10.99
8	γ Scorpü	W E	...	14 54 10.0 15 1 55.0	4 19.6 3 25.4	46.50 48.95	52.95 55.15	...	116 8 13.36 243 43 40.84	+ 0.87 + 3.06	+ 28.90 - 18.09	-1 52.57 +1 52.56	-24 53 57.09
9	May 20, H. 128 H¹. Camelop.	W E	...	11 56 1.0 12 4 4.0	3 58.8 4 4.2	42.15 44.75	51.55 54.40	...	227 7 40.69 132 44 22.06	+ 0.04 + 2.62	- 2.22 + 2.32	+1 0.01 -1 0.01	+86 7 52.57
10	May 29, H. ρ Scorpü	W E	...	15 48 17.0 15 54 22.0	2 47.6 3 17.4	45.45 51.85	47.35 53.30	26.792 23.311	112 5 56.38 247 46 0.28	+ 0.53 + 6.34	+ 11.26 - 15.62	-2 19.89 +2 19.88	-28 55 43.44
11	ρ Ophiuchi (s. star)	W E	...	16 14 44.0 16 21 31.0	5 12.9 1 34.1	47.90 52.60	49.45 53.85	25.776 23.199	117 47 56.08 242 3 59.08	+ 2.67 + 6.96	+ 43.18 - 3.91	-1 48.19 +1 48.13	-23 13 18.85
12	20 Ophiuchi	E W	...	16 41 21.0 16 47 50.0	3 17.9 3 11.1	55.35 50.85	55.30 51.50	23.495 26.400	229 27 58.75 130 23 57.50	+ 8.93 + 5.02	- 21.47 + 20.02	+1 7.31 -1 7.31	-10 36 33.03
13	60 Herculis	W E	...	16 57 30.0 17 3 17.0	3 33.9 2 13.1	48.95 53.75	49.65 53.80	23.521 25.660	153 54 1.05 205 57 59.88	+ 3.25 + 7.46	+ 43.10 - 16.69	- 28.16 + 28.14	+12 52 33.34
14	ξ Ophiuchi	E W	...	17 11 21.0 17 17 57.0	4 1.2 2 34.8	54.05 50.60	54.30 50.95	22.675 27.681	239 51 57.58 110 59 55.32	+ 7.84 + 4.64	- 26.63 + 10.97	+1 39.09 -1 39.08	-21 0 23.99
15	May 30, H. 83 Virginis	E W	...	13 35 45.0 13 41 42.0	3 41.6 2 15.4	50.50 47.00	53.15 49.55	24.444 25.748	234 32 1.35 125 19 56.52	+ 5.78 + 2.42	- 24.61 + 9.19	+1 18.78 -1 18.78	-15 41 22.56
16	11 Boötis	W E	...	13 54 30.0 13 59 25.0	2 27.5 2 27.5	44.75 49.55	47.10 52.15	24.560 25.232	168 52 0.02 190 59 59.78	+ 0.21 + 4.86	+ 42.53 - 42.53	- 10.98 + 10.99	+27 51 32.42

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.	No	Zenith point.	Red. to 1902 O.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				
15 11 8	62.1	65.3	29.978	1, 2, 3, 4, 5, 6, 7, 8, 9. Observation at V with fixed thread.	1	179 56 3.68	
11 20	60.7	62.0	29.976		2	3.49	+ 17.49
17 13 10	60.8	70.5	29.714		3	4.08	+ 5.70
13 30	68.7	...	...		4	4.79	
13 51	67.9	...	...		5	6.54	
14 4	...	69.0	29.718		6	5.94	
14 11	67.6	...	...		7	5.65	
14 36	66.9	...	...		8	4.46	
14 58	66.4	67.5	29.716		9	2.76	- 6.20
12 0	69.9	...	...		10	1.68	+ 4.05
12 11	...	71.0	29.916		11	1.07	+ 1.02
29 15 44	...	58.0	29.964		12	2.23	...
15 51	55.0	...	...		13	2.30	- 1.46
16 18	54.8	...	...		14	2.12	- 4.02
16 26	...	57.0	29.956		15	179 55 59.24	+ 13.95
16 45	54.1	...	...		16	58.20	
17 0	53.3	...	...		
17 15	53.4	56.0	29.957				
30 13 29	...	72.0	30.068				
13 39	68.1	...	...		
13 57	67.9	...	...		
14 5	69.0	...	30.066				

Notes.

6 W. One level reading increased 2 div.

11. Assumed that south star was observed.

15 E. Micrometer reading increased 1 rev.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Scorpii	E		15 47 44.0	3 20.8	51.75	54.15	23.390	247 45 57.28	+ 6.83	-16.17	+2 17.83	-28 55 44.45
		W		15 53 34.0	2 20.2	48.70	51.20	26.631	112 5 55.78	+ 4.00	+ 8.92	-2 17.78	
2	γ Scorpii	W		16 2 48.0	3 44.5	47.35	40.85	27.042	121 47 58.02	+ 2.74	+23.78	-1 30.66	-19 12 23.46
		E		16 8 46.0	2 13.5	50.15	52.50	22.331	238 3 59.30	+ 5.30	- 8.41	+1 30.66	
3	ρ Ophiuchi (<i>s. star</i>)	E		16 15 46.0	4 11.1	50.60	52.85	23.779	242 3 59.12	+ 5.68	-27.80	+1 46.58	-23 13 18.92
		W		16 22 11.0	2 13.9	48.90	51.15	26.487	117 47 56.08	+ 4.08	+ 7.91	-1 46.53	
4	α Ophiuchi	W		16 40 39.0	4 0.1	47.60	50.35	26.032	130 23 58.15	+ 3.09	+31.60	-1 6.31	-10 36 32.86
		E		16 47 2.0	2 22.9	50.35	53.35	23.220	229 27 59.40	+ 5.80	-11.19	+1 6.31	
5	α Herculis	E		16 57 30.0	3 34.1	51.00	53.55	26.300	205 57 58.75	+ 6.20	-43.18	+ 27.71	+12 52 32.70
		W		17 3 27.0	2 22.0	48.85	51.15	23.971	153 54 0.82	+ 4.05	+10.23	- 27.69	
6	ζ Ophiuchi	W		17 11 40.0	3 42.5	48.00	50.60	27.292	119 59 57.02	+ 3.40	+22.66	-1 37.52	-21 0 22.94
		E		17 18 16.0	2 53.5	50.15	53.20	22.290	239 51 59.92	+ 5.04	+3.78	+1 37.53	
7	June 1, H. α Ursæ Minoris <i>s. p.</i>	E		13 20 20.0	3 14.9	49.55	48.55	27.095	127 37 55.38	+ 0.76	- 0.43	-1 12.26	+88 46 56.24
		W		13 26 23.0	2 48.1	50.60	49.55	22.822	232 13 57.58	+ 1.72	+ 0.32	+1 12.28	
8	μ Serpentis	W		15 41 15.0	3 30.2	50.85	49.40	23.814	137 53 56.40	+ 1.76	+27.95	- 50.85	- 3 7 51.93
		E		15 47 3.0	2 17.8	49.60	48.35	25.589	221 58 0.72	+ 0.68	-12.01	+ 50.85	
9	γ Herculis	E		15 53 17.0	3 47.7	49.70	48.65	25.643	200 46 0.60	+ 0.87	-58.78	+ 21.52	+18 5 21.28
		W		15 59 40.0	2 35.3	50.50	49.20	24.802	159 6 0.15	+ 1.50	+27.36	- 21.51	
10	α Scorpii	W		16 12 20.0	3 9.3	49.45	48.30	26.318	115 39 56.62	+ 0.59	+15.25	-1 56.57	-25 21 28.99
		E		16 18 31.0	3 1.7	48.95	48.05	23.508	244 11 59.45	+ 0.24	-14.05	+1 56.58	
11	γ B. Ursæ Minoris	E		16 31 59.0	3 7.7	49.65	48.65	26.042	141 11 57.65	+ 0.85	+ 5.12	- 45.31	+77 38 34.63
		W		16 38 2.0	2 55.3	51.35	49.90	22.873	218 39 57.05	+ 2.24	- 4.46	+ 45.31	
12	α Herculis	W		16 57 39.0	3 24.0	48.80	48.05	23.498	153 54 0.72	+ 0.17	+39.21	- 27.67	+12 52 33.58
		E		17 3 31.0	2 28.0	49.10	48.45	25.750	205 57 59.40	+ 0.50	-20.64	+ 27.66	
13	ζ Ophiuchi	E		17 12 12.0	3 11.2	49.75	48.55	22.575	239 51 55.15	+ 0.85	-16.73	+1 37.45	-21 0 23.87
		W		17 18 9.0	2 45.8	50.95	49.50	21.638	120 3 56.62	+ 1.86	+12.58	-1 37.43	
14	June 2, H. α Ursæ Minoris <i>s. p.</i>	E		13 20 35.0	3 1.2	50.60	49.75	27.015	127 37 55.78	+ 0.74	- 0.37	-1 11.06	+88 46 56.32
		W		13 26 35.0	2 58.8	51.00	50.10	22.789	232 13 58.90	+ 1.09	+ 0.36	+1 11.06	
15	γ H. Scorpii	E		15 27 13.0	4 7.3	52.40	51.10	22.324	246 39 59.58	+ 2.22	-24.99	+2 8.13	-27 48 44.29
		W		15 34 22.0	3 1.7	51.50	49.80	27.730	113 11 55.42	+ 1.18	+13.49	-2 8.09	
16	γ Herculis	E		15 53 37.0	3 28.1	52.40	50.65	25.405	200 45 59.85	+ 2.00	-40.00	+ 21.13	+18 5 22.48
		W		15 59 54.0	2 48.9	51.20	49.20	24.729	159 6 0.90	+ 0.75	+32.35	- 21.12	

Time	Ther- m.	Atm- ther.	Barom.	Observation made at V with movable thread, except as noted below.							No.	Zenith point.	Red. to 1902.0
<i>h m s</i>	<i>°</i>	<i>°</i>	<i>mm</i>									<i>° ' "</i>	<i>"</i>
15 51 42		66.2	10.000								1	179 55 58.27	+4.00
15 51	64.0										2	57 60	
15 5	64.0										3	57 08	+1.06
15 19	63.7										4	58 14	
15 28		66.0	10.015								5	58 40	-1.65
15 44	64.0										6	58 00	-4.02
15 5	62.9										7	55 08	
15 11	62.8										8	55 55	
15 24		64.2	10.026								9	54 04	+0.11
15 17		72.3	10.179								10	55 51	
15 24	60.8										11	55 41	-3.99
15 11		69.0	10.176								12	54 12	-2.07
15 44	66.9										13	57 01	-4.07
15 16		66.1									14	54 24	
15 1		68.3	10.106								15	54 57	+6.14
15 17	66.2										16	56 12	-0.10
15 17	65.7												
15 46		68.0	10.134										
15 1	65.1												
15 15	64.7												
15 24		67.0	10.148										
15 17		77.0	29.926										
15 24	55.8												
15 11	71.4												
15 57	71.5												

Notes.
 1. Assumed that south star was observed.
 6. Paint clouds.
 11 W. One microscope reading decreased 10".
 12 E. Clock time decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	σ Scorpii	W	...	16 12 12.0	3 17.8	50.25	48.65	26.274	115 39 55.95	+ 0.04	+16.65	-1 54.61	-25 21 29.14
		E	...	16 17 55.0	2 25.2	50.55	49.45	23.475	244 11 58.02	+ 0.57	- 8.97	+1 54.60	
2	γ B. Ursæ Minoris	E	...	16 32 6.0	3 1.1	52.05	50.15	26.873	141 11 58.55	+ 1.60	+ 4.76	- 44.50	+77 38 34.16
		W	...	16 37 55.0	2 47.9	51.95	49.90	22.840	218 39 58.02	+ 1.43	- 4.09	+ 44.50	
3	δ Herculis	W	...	16 57 47.0	3 18.2	50.70	49.10	23.569	153 53 59.18	+ 0.47	+37.01	- 27.17	+12 52 33.54
		E	...	17 4 4.0	2 58.8	51.10	50.05	26.000	205 57 58.55	+ 1.12	-30.12	+ 27.18	
4	ϵ Ophiuchi	W	...	17 12 0.0	3 23.6	51.05	49.50	27.308	119 59 56.80	+ 0.82	+18.98	-1 35.66	-21 0 23.39
		E	...	17 18 22.0	2 58.4	51.70	50.20	22.409	239 51 58.82	+ 1.46	-14.57	+1 35.66	
5	June 4, H. α Ursæ Minoris S. P.	W	...	13 20 35.0	3 4.0	50.55	49.90	22.875	232 13 57.15	+ 2.06	+ 0.39	+1 10.96	+88 46 55.33
		E	...	13 26 35.0	2 56.0	48.60	47.95	27.048	127 37 55.48	+ 0.22	- 0.35	-1 10.94	
6	δ Virginis	E	...	13 35 51.0	3 37.4	49.90	49.05	24.566	234 31 59.72	+ 1.34	-23.68	+1 17.16	-15 41 23.73
		W	...	13 42 32.0	3 3.6	51.05	50.20	25.439	125 19 55.68	+ 2.43	+16.89	-1 17.16	
7	η Boötis	W	...	13 54 52.0	2 7.3	49.05	48.35	24.740	168 51 59.25	+ 0.62	+31.68	- 10.77	+27 51 31.40
		E	...	13 59 33.0	2 33.7	49.65	48.80	25.373	190 59 59.90	+ 1.11	-46.18	+ 10.77	
8	γ Libræ	E	...	14 14 53.0	3 32.2	50.55	49.65	25.933	230 5 59.30	+ 1.94	-24.40	+1 5.95	-11 16 8.06
		W	...	14 21 22.0	2 56.8	52.00	50.65	23.909	129 45 57.40	+ 3.08	+16.94	-1 5.96	
9	B. D. +43°25'10"	W	...	15 32 ....	.....	50.95	49.55	25.125	184 30 2.10	+ 1.34	- 0.32	+ 4.44	+43 29 33.58
		E	...	.....	.....	48.70	47.75	24.561	175 22 1.72	- 0.57	+ 0.32	- 4.44	
10	λ Libræ	E	...	15 44 40.0	3 15.2	49.85	48.80	22.799	238 43 58.35	+ 1.20	-17.77	+1 31.31	-19 52 28.36
		W	...	15 50 43.0	2 47.8	53.25	51.55	27.145	121 7 59.38	+ 4.10	+13.13	-1 31.31	
11	σ Serpentis	W	...	16 14 3.0	3 19.6	50.55	49.10	25.658	142 15 59.15	+ 1.67	+27.66	- 42.80	+ 1 15 33.21
		E	...	16 20 9.0	2 46.4	49.10	48.05	26.849	217 34 0.00	+ 0.50	-19.23	+ 42.88	
12	γ Scorpii	E	...	16 32 42.0	3 28.8	50.20	49.45	24.011	236 23 58.55	+ 1.68	-21.10	+1 23.86	-17 33 9.06
		W	...	16 39 22.0	3 11.2	51.45	50.00	25.985	123 27 54.22	+ 2.52	+17.74	-1 23.87	
13	γ Ophiuchi	W	...	16 50 12.0	0 58.0	50.85	49.75	29.068	117 59 55.62	+ 2.12	+ 1.49	-1 44.21	-22 59 39.00
		E	...	16 53 59.0	2 49.0	49.05	48.45	21.128	241 51 58.62	+ 0.66	-12.64	+1 44.22	
14	η Ophiuchi	E	...	17 1 40.0	3 21.9	50.45	49.40	22.675	234 27 59.50	+ 1.77	-20.46	+1 18.13	-15 36 9.75
		W	...	17 7 35.0	2 33.1	52.95	51.35	27.375	125 23 56.38	+ 3.86	+11.77	-1 18.13	
15	θ Ophiuchi	W	...	17 12 41.0	3 35.1	52.35	50.80	28.248	116 5 54.45	+ 3.32	+19.84	-1 52.04	-24 54 1.06
		E	...	17 19 2.0	2 45.9	49.60	48.90	24.363	243 43 58.58	+ 1.14	-11.80	+1 52.92	
16	June 5, H. α Ursæ Minoris S. P.	E	...	13 20 38.0	3 2.5	50.35	49.10	27.047	127 37 55.72	+ 1.20	- 0.38	-1 12.06	+88 46 55.91
		W	...	13 26 38.0	2 57.5	51.95	50.80	22.753	232 13 59.20	+ 2.76	+ 0.36	+1 12.09	
17	δ Virginis	W	...	13 36 12.0	3 16.9	50.90	49.45	25.489	125 19 56.32	+ 1.62	+19.43	-1 18.45	-15 41 21.27
		E	...	13 41 56.0	2 27.1	49.65	48.55	24.203	234 31 59.30	+ 0.62	-10.84	+1 18.47	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.	No.	Zenith point.	Red. to 1902 °
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m.</i>				
2 16 15	70.8	...	...	9. Instrument in meridian; observation at IX.	1	179 55 56.00	...
16 25	70.6	73.0	29.916		2	54.27	- 4.15
16 35	70.0	...	...		3	54.30	- 2.38
17 1	69.8	...	...		4	55.38	- 4.12
17 15	69.8	...	...		5	55.90	...
17 23	...	72.0	29.898		6	56.29	+13.78
4 13 13	...	76.5	29.796		7	56.50	...
13 24	73.8	...	...		8	56.10	+ 9.95
13 39	73.8	...	...		9	56.80	- 3.00
13 46	...	76.0	29.774		10	58.06	...
13 57	73.1	...	...		11	56.06	- 0.10
14 18	72.8	75.0	29.787		12	56.68	- 0.67
15 20	69.7	72.5	29.824		13	56.94	- 1.99
15 48	69.5	...	...		14	57.43	...
16 9	...	71.5	29.834		15	56.08	...
16 17	68.8	...	...		16	56.36	...
16 36	67.6	...	...		17	56.94	+13.78
16 52	66.0	70.5	29.835				
17 5	66.0	...	...	Note.			
17 16	66.7	...	...	10 W. One microscope reading decreased 10".			
17 25	...	69.5	29.836				
5 13 15	...	74.5	29.988				
13 24	69.2	...	...		
13 39	69.0	...	...		
13 48	...	70.5	29.996				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	2 Libræ	W		14 14 56.0	3 20.7	50.00	49.40	23.870	129 45 58.08	+ 1.18	+23.82	-1 7.24	-11 10 8.17
		E		14 20 52.0	2 26.3	49.85	48.85	25.581	230 5 59.75	+ 0.85	-11.60	+1 7.25	
2	3 Serpentis	E		15 0 51.0	3 44.5	49.45	50.25	26.579	213 31 59.60	+ 2.36	-38.47	+ 37.48	+ 5 18 7.23
		W		15 13 10.0	2 40.5	49.55	49.95	23.597	146 19 50.15	+ 2.26	+19.66	- 37.40	
3	4 Serpentis	W		15 41 19.0	3 28.0	46.80	48.05	23.843	137 53 57.05	+ 0.07	+27.36	- 50.90	- 3 7 51.45
		E		15 47 20.0	2 39.0	47.70	49.00	25.081	221 57 59.15	+ 0.94	-15.99	+ 50.90	
4	7 Herculis	E		15 53 31.0	3 35.5	48.20	49.75	25.533	200 45 58.08	+ 1.54	-52.65	+ 21.52	+18 5 21.34
		W		15 59 45.0	2 38.5	48.15	49.15	24.790	159 5 59.55	+ 1.22	+28.50	- 21.51	
5	6 Scorpii	W		16 12 7.0	3 24.1	46.95	48.40	26.339	115 39 54.28	+ 0.31	+17.73	-1 56.80	-25 21 28.85
	June 6, H.	E		16 17 39.0	2 7.9	47.40	48.60	23.342	244 11 58.72	+ 0.61	- 6.96	+1 56.81	
6	7 Virginis	W		12 31 1.0	3 26.5	46.10	48.05	24.429	133 33 58.45	+ 0.07	+24.78	- 57.80	- 7 27 36.43
		E		12 37 2.0	2 34.5	48.00	49.05	24.989	226 18 3.42	+ 1.72	-13.87	+ 57.81	
7	6 Virginis	E		12 45 58.0	3 33.7	47.95	49.60	23.810	227 52 2.82	+ 1.68	-25.78	+1 1.15	- 9 0 38.47
		W		12 52 6.0	2 34.3	47.25	49.30	26.192	131 59 58.60	+ 1.20	+13.44	-1 1.16	
8	69 H. Ursæ Majoris	E		13 21 48.0	3 19.1	52.25	50.65	24.940	158 24 0.08	+ 2.74	+22.60	- 21.86	+60 27 10.60
		W		13 28 40.0	3 32.9	51.45	50.15	21.845	201 29 59.58	+ 2.12	-25.83	+ 21.86	
9	89 Virginis	W		13 41 31.0	3 18.5	51.05	49.70	23.208	123 23 56.85	+ 1.72	+19.09	-1 23.88	-17 38 58.18
		E		13 47 38.0	2 48.5	51.05	49.90	23.502	236 29 59.78	+ 1.82	-13.76	+1 23.88	
10	7 Virginis	E		13 54 16.0	2 40.1	50.95	49.60	27.619	216 47 59.55	+ 1.63	-18.10	+ 41.74	+ 2 1 0.15
		W		14 0 18.0	3 21.9	51.20	50.00	24.758	143 1 59.40	+ 1.94	+28.79	- 41.74	
11	50 B. Draconis	W		14 26 2.0	3 17.3	49.35	48.15	25.221	201 40 1.30	+ 0.19	-21.85	+ 22.19	+60 39 31.68
		E		14 32 6.0	2 46.7	49.55	48.35	24.045	158 12 1.80	+ 0.38	+15.60	- 22.19	
12	2 H. Ursæ Minoris	E		14 52 6.0	4 11.7	51.10	49.85	24.660	152 32 2.95	+ 1.82	+23.45	- 28.87	+60 10 27.16
		W		15 0 8.0	3 50.3	52.00	50.55	24.851	207 20 0.48	+ 2.57	-19.63	+ 28.87	
13	3 Serpentis	W		15 7 9.0	3 26.8	53.95	50.00	23.282	146 19 59.20	+ 2.05	+32.64	- 37.03	+ 5 18 7.87
		E		15 13 3.0	2 27.2	50.90	49.50	26.052	213 31 59.52	+ 1.50	-16.54	+ 37.03	
14	7 Coronæ Borealis	E		15 19 ....	....	50.90	49.50	25.729	188 12 1.45	+ 2.29	+ 0.20	+ 8.12	+30 38 30.70
		W		....	....	52.05	50.70	23.852	171 40 1.45	+ 3.39	- 0.20	- 8.12	
15	B. D. +43° 25.0	W		15 32 ....	....	51.40	50.00	25.130	184 30 2.62	+ 1.29	- 0.32	+ 4.46	+43 29 33.59
		E		....	....	50.50	49.25	24.542	175 22 2.10	+ 0.52	+ 0.32	- 4.46	
16	June 11, H. Libræ	W		15 44 40.0	3 21.5	50.80	49.10	26.963	121 7 58.90	+ 0.68	+18.94	-1 30.85	-10 52 30.31
		E		15 50 39.0	2 37.5	50.60	49.55	22.620	238 43 59.15	+ 0.80	-11.57	+1 30.85	
17	62 Scorpii	E		15 58 32.0	3 30.3	51.20	49.65	22.469	230 27 58.85	+ 1.14	-20.38	+1 33.58	-20 36 16.50
		W		16 4 38.0	2 35.7	52.15	51.25	27.629	120 23 55.75	+ 2.34	+11.17	-1 33.55	
18	6 Serpentis	W		16 14 2.0	3 27.0	51.00	49.50	25.629	142 15 59.20	+ 0.96	+29.76	- 42.63	+ 1 15 33.81
		E		16 20 1.0	2 32.0	49.95	48.95	26.777	217 33 59.55	+ 0.22	-16.04	+ 42.63	

Observation made at V with movable thread, except as noted below:

Time	Ther- m.	Air ther.	Barom	No.	Zenith point	Red. to 1902.0
4 4 m	60.0	60.0	30.014	14	55.01	9.93
4 14.15	60.0	60.0	30.012	15	55.88	
4 24.04	60.0	60.0	30.014	16	54.56	
4 34.00	60.0	60.0	30.016	17	54.64	- 9.77
4 44.00	60.0	60.0	30.016	18	55.84	
4 54.00	60.0	60.0	30.016	19	55.40	5.18.23
5 04.00	60.0	60.0	30.016	20	56.02	5.14.96
5 14.00	60.0	60.0	30.016	21	55.08	
5 24.00	60.0	60.0	30.016	22	55.14	
5 34.00	60.0	60.0	30.016	23	55.08	
5 44.00	60.0	60.0	30.016	24	55.08	
5 54.00	60.0	60.0	30.016	25	55.08	
6 04.00	60.0	60.0	30.016	26	55.08	
6 14.00	60.0	60.0	30.016	27	55.08	
6 24.00	60.0	60.0	30.016	28	55.08	
6 34.00	60.0	60.0	30.016	29	55.08	
6 44.00	60.0	60.0	30.016	30	55.08	
6 54.00	60.0	60.0	30.016	31	55.08	
7 04.00	60.0	60.0	30.016	32	55.08	
7 14.00	60.0	60.0	30.016	33	55.08	
7 24.00	60.0	60.0	30.016	34	55.08	
7 34.00	60.0	60.0	30.016	35	55.08	
7 44.00	60.0	60.0	30.016	36	55.08	
7 54.00	60.0	60.0	30.016	37	55.08	
8 04.00	60.0	60.0	30.016	38	55.08	
8 14.00	60.0	60.0	30.016	39	55.08	
8 24.00	60.0	60.0	30.016	40	55.08	
8 34.00	60.0	60.0	30.016	41	55.08	
8 44.00	60.0	60.0	30.016	42	55.08	
8 54.00	60.0	60.0	30.016	43	55.08	
9 04.00	60.0	60.0	30.016	44	55.08	
9 14.00	60.0	60.0	30.016	45	55.08	
9 24.00	60.0	60.0	30.016	46	55.08	
9 34.00	60.0	60.0	30.016	47	55.08	
9 44.00	60.0	60.0	30.016	48	55.08	
9 54.00	60.0	60.0	30.016	49	55.08	
10 04.00	60.0	60.0	30.016	50	55.08	
10 14.00	60.0	60.0	30.016	51	55.08	
10 24.00	60.0	60.0	30.016	52	55.08	
10 34.00	60.0	60.0	30.016	53	55.08	
10 44.00	60.0	60.0	30.016	54	55.08	
10 54.00	60.0	60.0	30.016	55	55.08	
11 04.00	60.0	60.0	30.016	56	55.08	
11 14.00	60.0	60.0	30.016	57	55.08	
11 24.00	60.0	60.0	30.016	58	55.08	
11 34.00	60.0	60.0	30.016	59	55.08	
11 44.00	60.0	60.0	30.016	60	55.08	
11 54.00	60.0	60.0	30.016	61	55.08	
12 04.00	60.0	60.0	30.016	62	55.08	
12 14.00	60.0	60.0	30.016	63	55.08	
12 24.00	60.0	60.0	30.016	64	55.08	
12 34.00	60.0	60.0	30.016	65	55.08	
12 44.00	60.0	60.0	30.016	66	55.08	
12 54.00	60.0	60.0	30.016	67	55.08	
13 04.00	60.0	60.0	30.016	68	55.08	
13 14.00	60.0	60.0	30.016	69	55.08	
13 24.00	60.0	60.0	30.016	70	55.08	
13 34.00	60.0	60.0	30.016	71	55.08	
13 44.00	60.0	60.0	30.016	72	55.08	
13 54.00	60.0	60.0	30.016	73	55.08	
14 04.00	60.0	60.0	30.016	74	55.08	
14 14.00	60.0	60.0	30.016	75	55.08	
14 24.00	60.0	60.0	30.016	76	55.08	
14 34.00	60.0	60.0	30.016	77	55.08	
14 44.00	60.0	60.0	30.016	78	55.08	
14 54.00	60.0	60.0	30.016	79	55.08	
15 04.00	60.0	60.0	30.016	80	55.08	
15 14.00	60.0	60.0	30.016	81	55.08	
15 24.00	60.0	60.0	30.016	82	55.08	
15 34.00	60.0	60.0	30.016	83	55.08	
15 44.00	60.0	60.0	30.016	84	55.08	
15 54.00	60.0	60.0	30.016	85	55.08	
16 04.00	60.0	60.0	30.016	86	55.08	
16 14.00	60.0	60.0	30.016	87	55.08	
16 24.00	60.0	60.0	30.016	88	55.08	
16 34.00	60.0	60.0	30.016	89	55.08	
16 44.00	60.0	60.0	30.016	90	55.08	
16 54.00	60.0	60.0	30.016	91	55.08	
17 04.00	60.0	60.0	30.016	92	55.08	
17 14.00	60.0	60.0	30.016	93	55.08	
17 24.00	60.0	60.0	30.016	94	55.08	
17 34.00	60.0	60.0	30.016	95	55.08	
17 44.00	60.0	60.0	30.016	96	55.08	
17 54.00	60.0	60.0	30.016	97	55.08	
18 04.00	60.0	60.0	30.016	98	55.08	
18 14.00	60.0	60.0	30.016	99	55.08	
18 24.00	60.0	60.0	30.016	100	55.08	

Notes.

1 E. One microscope reading increased 20".

1 F. Micrometer reading decreased 1 rev.

1 G. Humid.

1 H. Clock time decreased 1m.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>" "</i>	<i>' "</i>	<i>° ' "</i>
1	70 B. Ursæ Minoris	E	...	16 31 57.0	3 17.0	50.60	49.20	26.802	141 11 59.58	+ 0.64	+ 5.63	- 44.34	+77 38 36.91
	June 12, H.	W	...	16 38 3.0	2 49.0	53.80	51.90	22.841	218 39 59.90	+ 3.42	- 4.15	+ 44.34	
2	61 Virginis	E	...	13 10 15.0	3 23.9	49.65	49.10	22.669	236 37 56.88	+ 2.14	-20.10	+1 21.79	-17 46 13.09
		W	...	13 16 12.0	2 33.1	48.80	48.20	27.452	123 13 54.78	+ 1.32	+11.33	-1 21.78	
3	9 B. Ursæ Minoris	W	...	13 20 38.0	3 21.4	47.25	47.40	25.557	213 53 57.42	+ 0.22	- 9.05	+ 36.35	+72 54 9.3
		E	...	13 26 37.0	2 37.6	48.95	48.75	24.341	145 57 58.70	+ 1.65	+ 5.54	- 36.35	
4	13 B. Ursæ Minoris	E	...	13 31 49.0	3 23.9	49.15	48.75	23.529	147 7 59.22	+ 1.74	+10.20	- 34.85	+71 44 35.42
		W	...	13 37 44.0	2 31.1	48.80	48.50	26.098	212 43 57.95	+ 1.46	- 5.60	+ 34.85	
5	i Draconis	W	...	13 45 35.0	3 20.6	48.20	48.00	23.570	206 13 58.68	+ 0.94	-16.17	+ 26.71	+65 12 33.18
		E	...	13 51 38.0	2 42.4	48.65	48.50	26.328	153 37 59.45	+ 1.39	+10.58	- 26.71	
6	94 Virginis	E	...	13 58 2.0	3 26.7	49.25	49.05	25.384	227 15 56.90	+ 1.94	-24.39	+ 58.70	- 8 25 36.72
		W	...	14 3 59.0	2 30.3	48.50	48.15	24.819	132 35 53.88	+ 1.16	+12.89	- 58.70	
7	3 G. Libræ	W	...	14 15 47.0	3 48.8	47.40	47.25	25.300	116 39 56.42	+ 0.22	+22.65	-1 47.11	-24 21 54.42
		E	...	14 21 49.0	2 13.2	48.70	48.35	24.198	243 11 58.82	+ 1.34	- 7.68	+1 47.10	
8	56 B. Draconis	E	...	14 26 2.0	3 22.9	48.95	48.65	24.365	158 12 2.10	+ 1.60	+23.11	- 21.65	+60 39 32.74
		W	...	14 32 3.0	2 38.1	49.00	48.45	24.998	201 40 2.10	+ 1.53	-14.03	+ 21.65	
9	μ Libræ	W	...	14 40 50.0	3 29.4	48.60	48.45	26.262	127 15 58.82	+ 1.34	+22.73	-1 11.02	-13 44 35.15
		E	...	14 47 5.0	2 45.6	49.40	49.10	26.189	232 33 59.88	+ 2.03	-14.22	+1 11.02	
10	2 H. Ursæ Minoris	E	...	14 52 56.0	3 27.3	50.05	49.50	24.768	152 32 2.38	+ 2.52	+15.91	- 28.20	+66 19 28.86
		W	...	14 59 3.0	2 39.7	49.35	49.10	24.699	207 19 58.82	+ 2.00	- 9.44	+ 28.20	
11	1 H. Ursæ Minoris	W	...	15 10 28.0	3 24.9	48.40	47.90	24.411	208 44 0.75	+ 0.98	-14.02	+ 29.90	+67 43 15.05
	July 2, H.	E	...	15 16 27.0	2 34.1	48.80	48.35	25.436	151 7 59.80	+ 1.39	+ 7.93	- 29.90	
12	52 Hydræ	W	...	14 19 23.0	3 34.9	46.60	48.95	26.882	111 58 0.45	+ 0.07	+18.48	-2 14.69	-29 3 18.14
		E	...	14 25 22.0	2 24.1	52.55	54.30	22.532	247 53 59.95	+ 5.40	- 8.31	+2 14.68	
13	33 Boötis	E	...	14 35 ....	.....	53 60	55.70	24.025	174 2 4.60	+ 7.29	+ 0.34	- 5.71	+44 49 46.64
		W	...	.....	.....	51.00	53.05	25.318	185 50 3.32	+ 4.81	- 0.34	+ 5.71	
14	ξ ¹ Libræ	W	...	14 45 49.0	3 46.3	49.60	51.65	23.965	129 31 59.70	+ 2.76	+27.63	-1 6.65	-11 29 59.89
		E	...	14 52 11.0	2 35.7	53.55	55.80	25.325	230 20 1.00	+ 6.58	-13.08	+1 6.65	
15	c Boötis	E	...	15 0 46.0	2 45.0	54.50	56.30	25.678	193 36 3.18	+ 7.26	-44.19	+ 13.46	+25 15 7.78
		W	...	15 5 16.0	1 45.0	51.65	53.45	24.430	166 16 3.70	+ 4.57	+17.91	- 13.45	
16	α ² Libræ	W	...	15 13 30.0	4 35.7	51.45	54.75	25.180	126 13 59.18	+ 5.10	+38.70	-1 15.20	-14 47 6.51
		E	...	15 20 29.0	2 23.3	54.75	56.75	23.708	233 38 2.05	+ 7.59	-10.45	+1 15.23	
17	π Scorpïi	W	...	15 50 26.0	3 1.8	50.35	49.40	28.470	115 9 57.82	+ 0.70	+13.95	-1 57.05	-25 50 0.08
		E	...	15 55 57.0	2 29.2	52.30	51.65	24.000	244 40 1.30	+ 2.68	- 9.40	+1 57.04	
18	c ¹ Scorpïi	E	...	16 3 13.0	3 35.5	52.75	52.00	21.571	246 32 1.50	+ 3.06	-19.01	+2 7.47	-27 40 22.74
		W	...	16 9 55.0	3 6.5	51.05	50.15	25.108	113 22 1.42	+ 1.39	+14.24	-2 7.47	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.	No.	Zenith point.	Red. to 1902.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>" "</i>	<i>" "</i>
11 10 35	68.1			13. Instrument in meridian; observation at I.	1	179 55 55.22	- 7.16
10 51		70.0	29.648		2	55.64	
12 13 3		84.0	29.708		3	55.16	
13 13	82.4				4	54.86	- 7.90
13 24	81.9				5	55.36	- 7.21
13 35	81.0	82.0	29.710		6	55.33	
13 48	80.8				7	55.63	+12.89
14 1	80.1				8	55.20	- 6.92
14 19	79.8				9	55.34	+ 8.43
14 29	79.2	79.5	29.718		10	55.21	- 7.70
14 43	78.9				11	55.30	
14 56	78.0				12	56.04	+14.83
15 3		79.5	29.726		13	56.01	
15 13	77.9				14	57.80	+ 6.43
15 25		79.5	29.726		15	58.42	- 4.81
2 14 11		78.5	30.038		16	58.40	
14 22	78.3				17	53.96	+ 4.55
14 35	76.8				18	53.49	+ 3.59
14 46	76.1						
14 56		76.5	30.046	Note.			
15 3	75.3			9 H. Clock time increased 1m.			
15 17	74.8						
15 42		75.0	30.044				
15 53	72.9						
16 7	72.5						

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Scorpii	W	...	16 26 48.0	3 31.5	40.75	40.35	24.576	113 1 58.88	+0.40	+18.22	-2 9.70	-28 0 45.19
		E	...	16 32 45.0	2 25.5	51.20	50.00	24.802	246 49 59.55	+1.82	-8.62	+2 9.68	
2	(4) Vesta	W	...	19 42 59.0	3 31.6	50.05	49.30	24.385	118 47 58.10	+0.52	+20.08	-1 41.26	-22 14 17.70
		E	...	19 49 26.0	2 55.4	51.10	50.50	25.100	241 4 1.02	+1.58	-13.79	+1 41.25	
3	July 5, H. Serpents	E	...	15 38 39.0	3 34.1	49.15	48.90	24.365	203 8 6.00	+3.70	-47.53	+ 23.09	+15 43 48.38
		W	...	15 44 41.0	2 27.9	46.00	45.90	25.303	156 44 7.38	+0.80	+22.68	- 23.08	
4	Scorpii	W	...	15 50 12.0	3 17.5	45.10	45.55	28.179	115 10 3.22	+0.22	+16.47	-1 53.66	-25 49 59.33
		E	...	15 56 11.0	2 41.5	47.50	47.50	23.960	244 40 5.82	+2.26	-11.02	+1 53.64	
5	Serpents	E	...	16 14 7.0	3 33.1	48.00	48.10	23.915	217 36 2.62	+2.78	-31.52	+ 41.67	+ 1 15 37.68
		W	...	16 19 55.0	2 14.9	46.90	46.85	25.862	142 16 5.28	+1.67	+12.63	- 41.67	
6	(4) Vesta	W	...	19 40 23.0	3 25.5	47.45	45.50	23.808	118 28 2.02	+0.07	+18.83	-1 39.77	-22 34 37.04
		E	...	19 46 45.0	2 56.5	47.55	45.95	25.550	241 24 4.50	+0.33	-13.89	+1 39.70	
7	July 8, H. (4) Vesta	E	...	19 37 34.0	3 17.7	50.40	47.55	23.180	241 45 58.62	+0.07	-17.33	+1 42.20	-22 54 56.45
		W	...	19 44 19.0	3 27.3	50.90	47.70	26.122	118 6 6.62	+0.38	+19.05	-1 42.21	
8	July 11, H. Boötis	W	...	14 33 27.0	3 28.1	49.00	50.05	27.075	155 7 48.42	+2.31	+42.52	- 25.44	+14 8 56.58
		E	...	14 39 34.0	2 38.9	47.20	48.65	25.040	204 42 9.78	+0.81	-24.79	+ 25.43	
9	61 B. Draconis	E	...	14 46 0.0	3 23.1	48.90	49.75	26.728	159 8 4.82	+2.12	+24.90	- 20.94	+50 41 43.07
		W	...	14 52 0.0	2 36.9	51.05	51.75	25.025	200 42 4.12	+4.08	-14.86	+ 20.94	
10	Librae	W	...	15 13 37.0	4 24.5	49.15	50.25	25.048	126 13 58.20	+2.48	+35.61	-1 15.27	-14 47 7.49
		E	...	15 20 42.0	2 40.5	47.00	47.55	23.808	233 37 57.80	+0.18	-13.11	+1 15.25	
11	Librae	E	...	15 27 6.0	3 24.4	47.25	48.50	25.193	233 17 52.08	+0.76	-21.39	+1 14.40	-14 27 49.14
		W	...	15 32 59.0	2 28.6	51.15	51.95	24.590	126 33 57.58	+4.22	+11.31	-1 14.39	
12	Serpents	W	...	15 38 46.0	3 21.1	50.85	51.70	24.875	156 44 0.75	+3.96	+41.94	- 23.83	+15 43 48.85
		E	...	15 43 34.0	1 26.9	46.95	48.15	23.453	203 8 0.20	+0.46	+7.83	+ 23.82	
13	(4) Vesta	W	...	19 33 36.0	4 19.2	50.40	50.15	25.762	117 45 57.00	+3.00	+29.61	-1 46.28	-23 15 8.84
		E	...	19 40 34.0	2 38.8	47.80	48.30	23.169	242 5 57.52	+0.92	-11.12	+1 46.27	
14	July 12, H. Virginis	E	...	14 34 48.0	3 32.8	49.40	50.20	25.836	224 4 0.15	+2.14	-27.47	+ 53.12	- 5 14 1.51
		W	...	14 41 3.0	2 42.2	50.25	51.45	23.528	135 47 59.72	+3.14	+15.96	- 53.12	
15	Librae	W	...	15 27 6.0	3 24.2	49.50	50.55	24.340	126 33 56.52	+2.36	+21.34	-1 14.04	-14 27 48.15
		E	...	15 32 56.0	2 25.8	47.80	49.40	24.710	233 17 56.62	+1.02	-10.88	+1 14.06	

Time	Ther. 1902	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.							No	Zenith point.	Red. to 1902.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>									<i>° ' "</i>	<i>"</i>
15 10 10	71.9	...	...								1	179 58 52.42	
15 10 40	...	71.5	30.046								2	51.21	
15 11 10	...	70.5	29.998								3	50.98	
15 11 40	67.9	...	...								4	52.15	+ 3.10
15 12 10	...	87.0	29.816								5	52.17	-3.66
15 12 40	81.9	...	...								6	52.82	
15 13 10	81.1	...	...								7	49.16	
15 13 40	81.4	...	...								8	52.72	
15 14 10	...	84.5	29.810								9	48.39	
15 14 40	...	81.0	29.796								10	47.21	
15 15 10	79.0	...	...								11	47.85	
15 15 40	79.8	78.5	29.967								12	45.50	
15 16 10	...	76.0	29.958								13	46.64	
15 16 40	76.6	...	...								14	43.82	
15 17 10	74.9	...	...								15	44.10	.....
15 17 40	71.5	...	29.952										
15 18 10	72.8	...	...								
15 18 40	72.8	...	...								
15 19 10	70.9	...	...								
15 19 40	...	72.0	29.956										
15 20 10	...	66.0	29.946										
15 20 40	61.7	...	...								
15 21 10	...	58.0	29.854										
15 21 40	56.7	...	...								
15 22 10	...	56.0	29.850										

Notes.
 2. Parallax 6".46.
 6. Parallax 6".56.
 7. Parallax 6".59.
 9 W. Clock time decreased 5m.
 11 Parallax 6".61.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>" "</i>	<i>" "</i>	<i>' "</i>	<i>° ' "</i>
1	β Serpentis	E	...	15 38 42.0	3 24.9	48.05	49.35	24.390	203 7 56.30	+ 1.11	-43.53	+ 23.65	+15 43 48.59
		W	...	15 44 49.0	2 42.1	50.00	50.70	25.322	156 43 56.90	+ 2.66	+27.25	- 23.65	
2	ϵ^1 Scorpii	W	...	16 3 36.0	3 8.1	49.80	51.05	24.948	113 21 55.28	+ 2.74	+14.49	- 2 6.83	-27 40 23.57
		E	...	16 9 20.0	2 35.9	47.70	48.75	24.288	246 29 55.72	+ 0.66	- 9.95	+2 6.80	
3	γ Herculis	E	...	16 14 34.0	3 29.0	47.45	48.75	25.643	199 27 58.15	+ 0.54	-52.26	+ 19.66	+19 23 8.45
		W	...	16 20 33.0	2 30.0	50.00	51.05	24.180	160 23 59.15	+ 2.83	+26.93	- 19.65	
4	τ Scorpii	W	...	16 26 45.0	3 30.0	49.90	51.05	24.352	113 1 54.82	+ 2.78	+17.96	- 2 9.07	-28 0 46.65
		E	...	16 32 57.0	2 42.0	47.45	48.05	24.812	246 49 55.90	+ 0.21	-10.69	+2 9.04	
5	ι 8 Ophiuchi	E	...	16 40 49.0	3 25.6	47.90	49.00	24.534	243 17 52.40	+ 0.87	-18.26	+1 50.02	-24 28 5.47
		W	...	16 46 49.0	2 34.4	50.90	51.60	25.091	116 33 54.10	+ 3.51	+10.30	-1 50.03	
6	α Libræ July 13, H.	W	...	14 42 40.0	3 14.8	44.35	49.70	23.918	125 23 58.72	+ 0.19	+19.04	-1 16.19	-15 38 10.66
		E	...	14 48 33.0	2 38.2	45.65	50.80	25.173	234 28 0.32	+ 1.32	-12.55	+1 16.17	
7	σ^2 Libræ	W	...	15 13 37.0	4 24.3	44.90	50.10	25.049	126 13 56.28	+ 0.64	+35.56	-1 14.23	-14 47 6.83
		E	...	15 20 37.0	2 35.7	45.65	51.05	23.663	233 37 58.68	+ 1.44	-12.34	+1 14.20	
8	γ Libræ	E	...	15 27 9.0	3 21.3	46.55	51.90	24.880	233 17 59.65	+ 2.26	-20.74	+1 13.48	-14 27 48.51
		W	...	15 33 2.0	2 31.7	47.15	51.50	24.559	126 33 56.60	+ 2.36	+11.78	-1 13.48	
9	β Serpentis	W	...	15 38 29.0	3 38.0	46.80	51.65	24.698	156 43 59.42	+ 2.26	+49.28	- 23.47	+15 43 49.12
		E	...	15 44 38.0	2 31.0	46.30	51.35	23.783	203 7 58.40	+ 1.88	-23.65	+ 23.46	
10	π Scorpii	E	...	15 49 50.0	3 33.4	46.40	51.25	24.129	244 39 58.02	+ 1.88	-19.23	+1 55.62	-25 49 58.99
		W	...	15 55 48.0	2 24.6	47.40	52.05	25.430	115 11 55.80	+ 2.74	+ 8.83	-1 55.64	
11	(4) Vesta July 14, H.	W	...	19 33 0.0	2 56.1	46.45	50.90	27.211	117 31 56.50	+ 1.74	+13.62	-1 45.83	-23 28 24.19
		E	...	19 38 49.0	2 52.9	45.00	49.80	25.092	242 17 54.42	+ 0.54	-13.13	+1 45.81	
12	ι 09 Virginis	W	...	14 38 23.0	3 21.6	48.65	50.45	23.465	143 19 59.62	+ 0.50	+28.89	- 40.18	+ 2 18 19.01
		E	...	14 44 29.0	2 44.4	49.50	50.55	25.512	216 31 58.75	+ 0.95	-19.21	+ 40.18	
13	ϵ Libræ	W	...	15 5 3.0	2 2.5	50.40	51.10	25.636	121 35 57.12	+ 1.63	+ 7.06	-1 27.62	-19 25 21.91
		E	...	15 9 39.0	2 33.5	50.00	50.65	23.686	238 15 57.35	+ 1.22	-11.08	+1 27.62	
14	ν^1 Boötis	E	...	15 27 ....	....	50.00	50.90	26.178	177 39 59.30	+ 2.07	+ 0.29	- 2.14	+41 10 12.41
		W	...	....	....	51.50	52.00	25.891	182 9 57.48	+ 3.29	- 0.29	+ 2.14	
15	ι 49 H. Cephei S. P. July 16, H.	E	...	15 31 37.0	3 28.9	50.20	51.05	25.650	125 11 57.68	+ 1.68	- 1.45	-1 17.60	+86 20 6.71
		W	...	15 37 38.0	2 32.1	52.65	53.25	23.522	234 39 58.12	+ 3.86	+ 0.77	+1 17.58	
16	(4) Vesta	E	...	19 29 38.0	3 19.0	50.05	50.40	24.425	242 37 55.38	+ 1.30	-17.30	+1 47.30	-23 47 55.50
		W	...	19 35 30.0	2 33.0	54.15	54.00	25.080	117 13 54.32	+ 4.92	+10.23	-1 47.29	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.	No.	Zenith point.	Red. to 1502.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	
12 15 42	72.8	...	...	14. Instrument in meridian; observation at I.	1	179 55 44.46	...
15 51	74.0	...	29.850		2	43.86	+3.88
16 6	71.8	...	...		3	44.06	...
16 18	71.3	...	...		4	43.40	...
16 30	71.1	...	...		5	43.79	-0.65
16 44	70.7	...	...		6	44.95	...
16 55	...	72.5	29.854		7	43.82	...
13 14 35	81.0	81.0	29.896		8	44.50	...
14 46	81.3	...	...		9	42.77	...
15 8	80.5	80.5	29.896		10	45.01	+4.72
15 17	78.9	...	...		11	43.86	...
15 30	78.0	...	...		12	43.87	...
15 42	77.7	...	...		13	42.80	...
15 53	76.8	...	...		14	43.32	...
16 1	...	77.5	29.910		15	43.41	+15.04
19 29	...	72.5	29.918		16	44.33	...
19 36	70.1	...	...		
14 14 33	85.0	85.0	29.834	Notes.			
14 41	82.7	...	...	1. Faint clouds.			
15 7	81.7	...	...	11. Parallax 6".62.			
15 14	81.0	81.0	29.844	16. Parallax 6".64.			
15 27	80.3	...	...		
16 15 27	...	78.5	29.884				
15 35	74.9	...	...		
19 25	...	71.5	29.850				
19 33	68.9	...	...		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	(4) July 22, H. Vesta	W	...	19 23 49.0	3 17.4	51.50	51.25	23.385	116 37 58.25	+ 2.66	+16.85	-1 50.93	-24 25 0.52
		E	...	19 29 41.0	2 34.6	48.60	48.65	25.800	243 13 55.20	+ 0.07	-10.33	+1 50.94	
2	0 July 26, H. Ursæ Minoris	W	...	15 31 18.0	3 25.3	46.70	48.15	25.862	218 40 0.40	+ 1.02	- 6.09	+ 44.15	+77 40 48.95
		E	...	15 37 22.0	2 38.7	45.60	47.15	23.358	141 11 57.72	+ 0.02	+ 3.04	- 44.14	
3	(4) August 3, H. Vesta	W	...	19 13 27.0	3 28.6	50.85	49.85	24.913	115 33 59.02	+ 1.04	+18.49	-1 53.12	-25 27 57.49
		E	...	19 19 32.0	2 36.4	49.75	48.75	24.081	244 17 57.98	0.00	-10.39	+1 53.11	
4	87 August 4, H. B. Draconis	E	...	16 4 2.0	2 28.5	47.75	50.20	23.391	150 48 2.65	+ 2.00	+ 7.17	- 30.17	+68 4 23.82
		W	...	16 10 2.0	3 31.5	49.30	50.90	25.730	209 4 1.70	+ 3.06	-14.55	+ 30.17	
5	σ Herculis	W	...	16 31 ....	...	47.15	49.40	26.378	183 38 4.40	+ 0.61	- 0.31	+ 3.53	+42 38 37.20
		E	...	...	...	45.05	48.50	22.619	176 14 4.48	- 0.51	+ 0.31	- 3.53	
6	19 August 7, H. Ursæ Minoris	W	...	16 10 40.0	3 23.3	47.70	48.10	24.365	217 8 2.70	+ 0.85	- 6.95	+ 41.54	+76 7 45.82
		E	...	16 16 35.0	2 31.7	46.75	47.65	24.710	142 44 3.30	+ 0.19	+ 3.87	- 41.53	
7	λ Ophiuchi	E	...	16 22 57.0	3 31.0	47.75	48.45	26.128	216 38 1.05	+ 1.04	-31.57	+ 40.87	+ 2 12 1.44
		W	...	16 29 0.0	2 32.0	49.30	49.50	23.230	143 14 1.45	+ 2.20	+16.38	- 40.86	
8	k Herculis	W	...	16 42 35.0	3 28.7	47.05	48.10	24.322	148 26 2.88	+ 0.55	+35.08	- 33.63	+ 7 25 11.18
		E	...	16 48 30.0	2 26.3	47.15	47.90	24.228	211 26 2.88	+ 0.50	-17.24	+ 33.63	
9	117 G. Scorpii	E	...	16 52 39.0	3 24.1	47.35	47.75	22.789	250 50 1.42	+ 0.52	-15.86	+2 36.89	-31 59 52.80
		W	...	16 58 41.0	2 37.9	48.65	49.20	26.499	109 1 58.02	+ 1.82	+ 9.50	-2 36.86	
10	(4) Vesta	W	...	19 10 57.0	3 19.3	48.40	48.90	23.370	115 17 59.52	+ 1.56	+16.79	-1 55.97	-25 45 4.71
		E	...	19 18 32.0	4 15.7	47.85	47.35	26.047	244 33 59.08	+ 0.56	-27.64	+1 56.00	
11	19 August 8, H. Ursæ Minoris	W	...	16 10 34.0	3 29.5	49.05	48.60	24.339	217 8 3.22	+ 1.04	- 7.38	+ 40.96	+76 7 45.51
		E	...	16 16 34.0	2 30.5	48.35	47.85	24.712	142 44 1.75	+ 0.36	+ 3.81	- 40.96	
12	λ Ophiuchi	E	...	16 23 0.0	3 28.3	48.75	48.50	26.012	216 38 4.45	+ 0.85	-30.77	+ 40.32	+ 2 12 2.71
		W	...	16 28 51.0	2 22.7	50.30	50.35	23.281	143 14 1.82	+ 2.46	+14.44	- 40.31	
13	ζ Herculis	W	...	16 38 ....	...	49.45	48.75	24.354	172 48 2.70	+ 0.56	- 0.21	- 6.78	+31 47 4.12
		E	...	...	...	47.90	47.70	24.642	187 4 3.32	- 0.66	+ 0.21	+ 6.78	
14	24 Ophiuchi	E	...	16 47 55.0	3 29.2	48.75	48.30	23.933	241 49 59.35	+ 0.76	-19.37	+1 41.05	-22 59 38.73
		W	...	16 53 57.0	2 32.8	50.35	49.45	25.406	118 1 59.45	+ 2.04	+10.34	-1 41.04	
15	ζ Draconis	W	...	17 5 37.0	3 22.0	48.15	47.80	25.978	206 50 2.80	+ 0.24	-15.65	+ 27.57	+65 50 28.17
		E	...	17 12 55.0	3 56.0	47.90	47.05	22.828	153 2 6.65	+ 0.19	+21.37	- 27.57	
16	σ August 12, H. Scorpii	E	...	16 12 12.0	3 32.7	46.30	52.00	23.350	244 12 1.30	+ 1.14	-19.26	+1 54.41	-25 21 29.72
		W	...	16 18 10.0	2 25.3	47.95	52.75	26.031	115 39 58.42	+ 2.26	+ 8.99	-1 54.40	

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below						No.	Zenith point.	Red. to 1902 °
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>	5.13. Instrument in meridian, observation at IX.								
22 19 27	66.1	67.5	29.886							1	179 55 44.71	
26 10 14	75.4	76.5	29.914							2	42 44	-16.58
1 19 8	79.0	79.0	29.778							3	42 52	
19 16	77.5	77.5	29.746							4	43 06	
4 15 47	80.9	84.5	29.746							5	44 01	
16 7	79.6	82.0	29.766							6	43 10	
16 21	76.5	76.5	29.654							7	42 21	
16 14	73.5	73.5	29.646							8	42 22	-10.45
16 26	72.8	72.8	29.646							9	43 18	0.75
16 15	73.5	73.5	29.646							10	43 05	
16 46	72.1	72.1	29.642							11	42 02	
16 26	71.9	71.9	29.642							12	42 20	
17 4	74.0	74.0	29.642							13	42 46	
29 6	71.5	71.5	29.614							14	42 29	-1.68
12 15	68.8	68.8	29.710							15	41 40	
8 16 5	81.7	81.7	29.710							16	41 50	
16 14	80.9	80.9	29.714									
16 26	80.2	80.2	29.714									
16 21	79.9	79.9	29.718									
17 9	78.8	78.8	29.714									
22 16 6	74.5	74.5	29.714									
26 15	71.9	71.9	29.714									

Notes.

- 1 Parallax 6' 00.
 3 Parallax 6' 4".
 4 Clock time increased 1^m.
 10 Parallax 6' 00.
 11 W Micrometer reading increased 1 rev.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	<i>k</i> Herculis	W		16 42 39.0	3 25.1	48 40	48.90	24.389	148 26 3.28	+ 2.97	+33.87	- 34.04	+ 7 25 12.31
	August 22, H.	E		16 48 30.0	2 25.9	47.65	48.30	24.241	211 26 1.65	+ 2.33	-17.14	+ 34.03	
2	14) Vesta	W		19 5 20.0	3 25.1	49.65	50.40	26.095	114 30 0.50	+ 3.32	+17.56	-2 1.24	-26 31 16.85
	October 7, H.	E		19 11 32.0	2 40.9	46.00	47.20	22.939	245 21 57.88	+ 0.10	-11.62	+2 1.29	
3	51 H. Cephei S. P.	W		18 53 25.0	2 13.0	53.65	53.25	24.223	233 47 57.10	+ 3.65	+ 0.46	+1 17.00	+87 11 42.88
		E		18 58 50.0	3 12.0	50.50	50.25	24.910	126 4 6.32	+ 0.75	- 0.95	-1 17.00	
4	Groombridge 1255 S. P.	E		19 4 18.0	3 8.7	50.40	50.80	25.315	120 18 5.12	+ 0.97	- 2.61	-1 35.84	+81 25 38.95
		W		19 9 25.0	1 58.3	53.65	53.70	23.729	239 34 0.64	+ 3.86	+ 1.03	+1 35.85	
5	B. D. +83° 552	W		19 25 17.0	2 51.8	53.45	53.00		224 16 31.30	+ 3.44	- 2.09	+ 55.14	+83 16 53.94
	October 14, H.	E		19 30 15.0	2 6.2	49.60	49.85		135 35 6.98	+ 0.14	+ 1.13	- 55.14	
6	Groombridge 1278 S. P.	E		19 15 30.0	1 57.4	49.30	51.75		119 57 58.88	+ 0.66	- 1.04	-1 38.93	+81 5 14.79
		W		19 20 20.0	2 52.6	49.90	51.85		239 53 34.62	+ 0.99	+ 2.26	+1 38.94	
7	B. D. +83° 552	W		19 25 15.0	2 50.5	49.10	51.40		224 16 33.28	+ 0.40	- 2.06	+ 56.07	+83 16 54.77
		E		19 30 39.0	2 33.5	48.90	51.20		135 35 5.52	+ 0.21	+ 1.68	- 56.09	
8	51 H. Cephei	E		6 52 39.0	3 1.0	49.10	50.40		131 40 29.60	+ 0.07	+ 0.91	-1 5.94	+87 11 39.40
		W		6 59 17.0	3 37.0	49.20	50.40		228 11 5.50	+ 0.12	- 1.31	+1 5.95	
9	Groombridge 1255	W		7 4 13.0	3 13.1	49.30	50.50		222 25 19.45	+ 0.21	- 3.48	+ 53.95	+81 25 38.77
		E		7 9 12.0	1 45.9	49.40	50.50		137 26 18.42	+ 0.26	+ 1.05	- 53.96	
10	Groombridge 1278	E		7 14 39.0	2 48.4	49.45	50.55		137 46 40.12	+ 0.30	+ 2.77	- 53.38	+81 5 14.58
		W		7 19 19.0	1 51.6	49.45	50.60		222 4 53.30	+ 0.33	- 1.22	+ 53.38	
11	B. D. +83° 552 S. P.	W		7 25 12.0	2 53.3	49.40	50.50		237 42 0.30	+ 0.26	+ 1.76	+1 33.42	+83 16 56.47
	October 15, H.	E		7 31 28.0	3 22.7	49.40	50.45		122 9 37.45	+ 0.24	- 2.40	-1 33.42	
12	51 H. Cephei S. P.	E		18 52 39.0	2 32.8	46.95	48.00		126 4 5.28	+ 0.16	- 0.60	-1 18.12	+87 11 41.89
		W		18 57 39.0	2 27.2	48.40	49.80		233 47 29.38	+ 1.70	+ 0.56	+1 18.11	
13	Groombridge 1255 S. P.	W		19 5 12.0	1 45.7	48.30	49.85		239 33 11.55	+ 1.68	+ 0.82	+1 37.38	+81 25 40.50
		E		19 9 19.0	2 21.3	47.60	48.95		120 18 23.62	+ 0.92	- 1.46	-1 37.35	
14	Groombridge 1278 S. P.	E		19 14 10.0	2 48.9	46.75	48.05		119 58 0.42	+ 0.10	- 2.16	-1 38.71	+81 5 14.40
		W		19 18 50.0	1 51.1	48.30	49.65		239 53 36.45	+ 1.58	+ 0.94	+1 38.70	
15	B. D. +83° 552	W		19 25 12.0	2 24.5	48.40	49.75		224 16 30.98	+ 1.67	- 1.48	+ 55.99	+83 16 54.57
		E		19 30 18.0	2 41.5	46.70	48.40		135 35 5.10	+ 0.24	+ 1.85	- 55.98	
16	51 H. Cephei	E		6 53 37.0	1 34.3	47.15	48.90		131 40 28.92	+ 0.26	+ 0.25	-1 5.31	+87 11 40.23
		W		7 0 19.0	5 7.7	47.45	48.90		228 11 8.32	+ 0.40	- 2.64	+1 5.31	
17	Groombridge 1255	W		7 4 28.0	2 29.1	47.10	48.85		222 25 21.38	+ 0.22	- 2.08	+ 53.16	+81 25 40.39
		E		7 9 39.0	2 41.9	47.25	48.85		137 26 15.50	+ 0.28	+ 2.45	- 53.16	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.	No.	Zenith point.	Red. to 1902.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
12 16 31		73.0	29.930	5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17. Observation with fixed thread.	1	179 55 45.50	-10.97
16 40	70.8				2	44.18	
22 19 8	66.4	68.5	29.776		3	45.96	
7 18 56	60.7	64.0	29.746		4	44.97	+39.77
19 7	60.7				5	50.45	-33.07
19 28	59.8				6	48.19	+31.67
19 35		62.5	29.750		7	49.50	-28.95
14 18 45		57.0	29.806		8	47.45	
19 18	54.0				9	47.05	+30.1
19 28	52.7	54.0	29.824		10	47.80	+11.67
6 47	43.0		29.806*		11	48.80	-33.96
6 50	40.3				12	48.24	
7 7	40.1				13	48.68	+30.41
7 17	39.7				14	48.66	+31.10
7 28	39.5				15	49.18	-34.28
7 35		41.5	29.836	2. E. Parallax 5". No.	16	47.76	
15 18 55	55.9	59.0	29.886	2 E. Micrometer reading decreased 1 rev.	17	48.88	+30.43
19 7	54.9			14 E. One microscope reading decreased 10".			
19 16	54.6			17 E. Clock time decreased 10".			
19 28	53.8			* Barometer reading changed from 29.886 to 29.806 in.			
19 34		56.0	29.822				
6 50		47.5	29.806				
6 57	41.8						
7 7	47.1						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Groombridge 1278	E	...	7 14 10.0	2 30.4	47.20	48.85	...	137 40 30.02	+ 0.26	+ 2.49	- 52.62	+81 5 10.25
		W	...	7 19 20.0	2 21.6	47.25	48.85	...	222 4 58.12	+ 0.28	- 1.96	+ 52.63	
2	B. D. +83° 55' 2" S. P.	W	...	7 25 12.0	2 23.9	47.00	48.55	...	237 42 2.48	+ 0.02	+ 1.21	+ 31.82	+83 16 56.99
		E	...	7 30 12.0	2 30.1	47.10	48.55	...	122 9 35.85	+ 0.07	- 1.43	- 31.81	
Time.		Ther. 1882.	Att. ther.	Barom.	Observation made at V with movable thread, except as noted below.						No.	Zenith point.	Red. to 1902.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m.</i>	1, 2. Observation with fixed thread.								<i>° ' "</i>	<i>"</i>
15 7 17	46.2	...	...							1	170 55 49.41	+ 31.10	
7 28	47.4	...	...							2	49.10	- 33.99	
7 38	...	49.0	29.808										

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	January 22, E. H ¹ . Camelop.	E W	...	3 33 58.0 3 40 0.0	2 54.0 3 8.0	45.95 50.35	51.40 54.40	..... .....	188 2 39.28 243 59 23.92	+ 3.18 + 6.29	+ 10.74 - 12.54	- 31.53 + 31.53	+66 54 0.43
2	τ ⁹ Eridani	W E	...	3 53 0.0 3 58 58.0	2 47.0 3 11.0	50.30 44.20	54.40 50.75	..... .....	152 49 43.00 279 12 22.10	+ 6.40 + 2.22	+ 12.08 - 15.81	- 1 57.05 + 1 57.07	-24 17 43.91
3	μ Tauri	E W	...	4 7 27.0 4 13 26.0	2 49.0 3 10.0	44.90 51.95	51.05 55.05	..... .....	246 17 17.15 185 44 37.88	+ 2.96 + 6.79	- 23.77 + 30.04	+ 34.68 - 34.68	+ 8 38 51.18
4	ρ Tauri	W E	...	4 25 30.0 4 31 31.0	2 50.8 3 10.2	50.40 44.15	54.40 50.90	..... .....	191 43 58.52 240 18 9.08	+ 6.53 + 2.18	+ 29.13 - 36.12	- 26.84 + 26.84	+14 38 19.35
5	μ Leporis	W E	...	5 5 45.0 5 11 45.0	2 49.6 3 10.4	47.75 42.40	53.05 49.55	..... .....	160 47 27.45 271 14 41.50	+ 4.87 + 1.22	+ 14.26 - 17.97	- 1 25.84 + 1 25.84	-16 19 28.25
6	ξ Aurigæ	E W	...	5 43 53.0 5 49 54.0	2 51.7 3 9.3	44.90 51.15	51.10 55.05	..... .....	199 15 8.30 232 46 56.95	+ 2.92 + 6.67	+ 24.44 - 29.71	- 18.05 + 18.05	+55 41 3.85
7	ι Geminorum	W E	...	5 55 21.0 6 1 24.0	2 53.0 3 10.0	50.25 43.55	54.20 50.80	..... .....	200 21 15.40 231 40 58.02	+ 6.10 + 2.29	+ 43.22 - 52.12	- 16.78 + 16.79	+23 15 58.15
8	κ Orionis	E W	...	6 8 10.0 6 14 8.0	2 50.3 3 7.7	44.95 51.45	51.35 55.05	..... .....	242 38 28.58 189 23 25.92	+ 2.79 + 6.95	- 26.84 + 32.61	+ 30.00 - 30.01	+12 17 47.14
9	January 23, E. τ ⁹ Eridani	E W	...	3 53 27.0 3 58 52.0	2 19.0 3 6.0	53.75 61.65	54.70 59.10	..... .....	279 12 15.85 152 49 40.95	+ 1.29 + 6.45	- 8.37 + 14.99	+ 1 58.09 - 1 58.09	-24 17 44.01
10	μ Tauri	W E	...	4 7 26.0 4 13 26.0	2 49.0 3 11.0	58.45 53.55	57.95 54.85	..... .....	185 44 45.02 246 17 24.55	+ 4.51 + 1.78	+ 23.77 - 30.36	- 34.99 + 34.99	+ 8 38 50.35
11	π ² Orionis	W E	...	4 41 37.0 4 47 37.0	2 56.6 3 3.4	58.25 53.45	57.75 55.25	..... .....	183 53 19.10 248 8 47.65	+ 4.60 + 1.68	+ 24.71 - 26.64	- 37.70 + 37.71	+ 6 47 21.83
12	μ Leporis	E W	...	5 5 45.0 5 11 45.0	2 48.6 3 11.4	56.40 62.40	56.10 59.05	..... .....	271 14 35.58 160 47 21.65	+ 2.91 + 6.51	- 14.09 + 18.16	+ 1 26.48 - 1 26.48	-16 19 28.85
13	25 Orionis	W E	...	5 16 55.0 5 22 51.0	2 46.9 3 9.1	60.50 54.85	58.30 55.55	..... .....	178 51 24.78 253 10 44.15	+ 5.60 + 2.23	+ 19.55 - 25.10	- 45.63 + 45.63	+ 1 45 15.37
14	23 Camelop.	E W	...	5 32 32.0 5 38 12.0	2 42.2 2 57.8	57.05 61.55	56.45 58.60	..... .....	193 30 45.35 238 31 19.35	+ 3.36 + 6.02	+ 13.95 - 16.76	- 24.97 + 24.97	+61 25 44.01
15	139 Tauri	W E	...	5 49 8.0 5 55 7.0	2 50.2 3 8.8	59.55 54.85	57.75 55.60	..... .....	203 1 32.20 229 0 46.25	+ 5.09 + 2.28	+ 49.17 - 1 0.49	- 13.91 + 13.91	+25 56 21.97
16	13 Monocerotis	W E	...	6 24 57.0 6 30 34.0	2 42.1 2 54.9	58.25 53.00	57.00 54.80	..... .....	184 30 1.12 247 32 7.52	+ 3.69 + 1.05	+ 21.15 - 24.63	- 37.00 + 37.00	+ 7 24 0.68
17	January 30, E. 258 G. Eridani	W E	...	4 33 0.0 4 39 3.0	2 59.4 3 3.6	57.20 47.45	58.15 52.15	..... .....	152 28 26.70 279 36 47.75	+ 8.26 + 2.53	+ 13.86 - 14.51	- 1 59.01 + 1 59.03	-24 40 35.82

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
22 3 21	.....	39.0	29.799							1	210 1 5.44	-10.10
3 37	36.5	.....	.....							2	5.00	+10.75
3 50	36.2	38.5	29.804							3	5.52	+ 7.87
4 10	36.0	.....	.....							4	4.66	+ 6.88
4 18	.....	38.0	29.808							5	5.66	+15.83
4 29	35.5	.....	.....							6	5.78	.....
4 59	.....	37.0	29.806							7	6.46	.....
5 8	33.7	.....	.....							8	5.00	+11.47
5 47	32.4	.....	.....							9	5.58	+16.89
5 58	33.0	.....	.....							10	4.64	+ 7.94
6 11	32.7	.....	.....							11	5.50	.....
6 21	.....	35.0	29.818							12	5.36	+16.88
23 1 17	.....	37.0	29.984							13	5.00	+13.30
3 56	34.9	.....	.....							14	5.64	+ 0.09
4 10	34.5	.....	.....							15	7.25	+ 8.14
4 25	34.2	.....	.....							16	4.95	+12.81
4 36	.....	36.5	29.985							17	210 2 42.30	+18.41
4 45	31.9	.....	.....							
5 8	31.2	.....	.....							
5 20	32.9	.....	.....							
5 35	32.5	.....	.....							
5 42	.....	35.0	30.000									
5 52	32.7	.....	.....							
6 27	32.1	34.5	30.021									
30 4 23	.....	36.0	29.672									
4 36	34.2	.....	.....							

Notes.
 2 E. One level reading increased 5 div.
 3 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>s ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	Orionis	E	...	4 44 22.0	2 35.7	48.50	52.50	...	240 52 40.05	+ 2.07	- 23.75	+ 27.51	+14 5 11.42
		W	...	4 49 28.0	2 30.3	57.25	58.50	...	191 12 34.05	+ 8.50	+ 22.13	- 27.51	
2	Orionis	W	...	5 13 52.0	2 51.7	54.05	56.20	...	176 38 55.20	+ 6.56	+ 19.71	- 48.78	- 0 28 53.94
		E	...	5 19 28.0	2 44.3	45.55	51.00	...	255 26 22.00	+ 1.18	- 18.05	+ 48.79	
3	Camelop.	E	...	5 27 46.0	3 4.2	46.45	51.55	...	198 39 20.30	+ 2.24	+ 26.73	- 18.62	+56 18 19.25
		W	...	5 33 44.0	2 53.8	55.85	57.55	...	233 25 41.85	+ 8.12	- 23.80	+ 18.62	
4	Aurigæ	W	...	5 43 53.0	2 46.5	56.10	57.65	...	232 48 26.72	+ 7.68	- 22.99	+ 17.92	+55 41 4.59
		E	...	5 49 35.0	2 55.5	45.75	51.05	...	199 16 44.45	+ 1.44	+ 25.54	- 17.92	
5	Geminorum	E	...	5 55 39.0	2 29.9	46.25	51.50	...	231 42 14.30	+ 1.59	- 32.45	+ 16.67	+23 15 58.70
		W	...	6 1 19.0	3 10.1	56.70	58.00	...	200 22 40.50	+ 8.14	+ 52.19	- 16.67	
6	Orionis	W	...	6 7 51.0	3 4.2	55.00	56.95	...	189 25 3.90	+ 7.27	+ 31.39	- 29.80	+12 17 46.38
		E	...	6 13 53.0	2 57.8	45.70	51.00	...	242 40 11.62	+ 1.16	- 29.25	+ 29.82	
7	G. Canis Majoris	E	...	6 52 20.0	2 12.8	45.80	51.00	...	280 13 15.40	+ 1.66	- 7.51	+2 2.50	-25 17 12.64
	January 31, E.	W	...	6 57 38.0	3 5.2	56.75	57.50	...	151 51 52.85	+ 8.45	+ 14.61	-2 2.51	
8	Tauri	W	...	3 32 11.0	2 41.8	47.90	48.45	...	202 7 48.12	+ 5.64	+ 41.87	- 14.61	+25 0 55.86
		E	...	3 38 3.0	3 10.2	42.10	44.60	...	229 57 43.92	+ 1.97	- 57.84	+ 14.61	
9	Persei	E	...	3 56 15.0	3 1.3	43.00	45.15	...	204 51 58.75	+ 2.61	+ 46.17	- 11.66	+50 5 23.10
		W	...	4 3 11.0	3 54.7	49.35	48.75	...	227 13 48.12	+ 6.24	- 17.32	+ 11.67	
10	Tauri	W	...	4 16 46.0	3 0.9	48.15	48.50	...	104 49 22.42	+ 5.57	+ 36.54	- 23.01	+17 42 16.24
	February 4, E.	E	...	4 22 51.0	3 4.1	41.20	44.50	...	237 15 55.50	+ 1.73	- 37.84	+ 23.01	
11	Eridani	E	...	4 11 55.0	2 12.1	43.50	49.50	...	288 57 25.30	+ 2.96	- 6.42	+3 1.20	-34 2 26.07
		W	...	4 16 33.0	2 25.9	48.90	52.75	...	143 7 44.60	+ 6.28	+ 7.83	-3 1.20	
12	Eridani	W	...	4 28 42.0	2 58.6	48.85	52.60	...	146 23 38.95	+ 6.17	+ 12.40	-2 31.26	-30 45 58.37
		E	...	4 34 46.0	3 5.4	42.55	49.15	...	285 41 35.90	+ 2.55	- 13.36	+2 31.29	
13	Orionis	E	...	4 43 4.0	2 52.6	43.95	49.05	...	249 31 29.20	+ 2.90	- 22.81	+ 37.47	+ 5 26 12.09
		W	...	4 49 0.0	3 3.4	50.60	53.55	...	182 33 42.08	+ 7.18	+ 25.75	- 37.46	
14	Camelop.	W	...	5 32 38.0	2 31.2	49.65	53.05	...	238 32 52.72	+ 6.39	- 12.12	+ 23.57	+61 25 45.27
		E	...	5 38 5.0	2 55.8	41.55	47.50	...	193 32 19.50	+ 1.07	+ 16.39	- 23.57	
15	Tauri	E	...	5 48 58.0	2 55.3	43.55	48.65	...	229 2 12.12	+ 2.20	- 52.17	+ 13.15	+25 56 23.45
		W	...	5 54 56.0	3 2.7	51.65	54.10	...	203 2 57.75	+ 7.55	+ 56.66	- 13.15	
16	Orionis	W	...	6 3 29.0	2 51.2	49.55	53.00	...	191 20 54.95	+ 6.36	+ 28.85	- 26.24	+14 13 38.83
		E	...	6 9 22.0	3 1.8	41.20	47.60	...	240 44 24.98	+ 1.04	- 32.58	+ 26.20	
17	Lyncis	E	...	6 19 30.0	2 47.7	42.70	48.05	...	196 43 55.92	+ 2.17	+ 19.00	- 20.04	+58 14 0.92
		W	...	6 25 13.0	2 55.3	51.05	54.00	...	235 21 18.80	+ 7.42	- 20.75	+ 20.04	
18	Geminorum	W	...	6 54 29.0	2 46.6	50.20	53.20	...	206 36 16.28	+ 6.47	+ 1 2.62	- 9.55	+29 29 49.71
		E	...	7 0 9.0	2 53.4	41.40	47.40	...	225 29 6.82	+ 1.21	- 1 7.81	+ 9.56	

Time.	Ther- 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No.	Zenith point.	Red. to 1903.0
1 h m	s		mm.									
1 47	14.1	15.5	29.688							1	216 2 42.42	+ 8.01
2 47	14.2									2	41.10	+ 11.16
3 47	14.1									3	42.22	+ 0.55
4 47		15.9	29.694							4	41.42	
5 47	14.1									5	42.14	
6 47	14.1									6	41.66	+ 11.52
7 47		15.9	29.708							7	42.19	+ 17.80
8 47	14.1									8	41.84	
9 47		15.9	29.714							9	42.70	+ 5.41
10 47	14.1									10	41.66	+ 5.21
11 47		15.9	29.714							11	42.08	
12 47	14.1									12	41.12	+ 28.41
13 47		15.9	29.726							13	42.15	+ 18.95
14 47	14.1									14	41.98	+ 3.01
15 47		15.9	29.730							15	42.06	+ 5.55
16 47	14.1									16	41.58	+ 14.12
17 47		15.9	29.738							17	41.58	+ 20.15
18 47	14.1									18	42.80	+ 16.68

Notes.
9. Clouds.
11. Hazy.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	51 Geminorum	E	...	7 5 8.0	2 34.9	42.40	47.90	...	238 38 44.72	+ 1.65	-25.42	+ 23.96	+16 19 12.77
	February 5, E.	W	...	7 10 30.0	2 47.1	52.35	54.45	...	193 26 23.65	+ 7.78	+29.59	+ 23.96	
2	α ² Eridani	W	...	4 7 50.0	2 52.0	38.75	48.70	...	169 19 38.50	+ 4.88	+17.08	-1 3.28	- 7 48 27.13
		E	...	4 13 55.0	3 13.0	32.95	44.95	...	262 45 41.78	+ 1.28	-21.50	+1 3.28	
3	ρ Tauri	E	...	4 25 18.0	2 56.5	33.55	45.30	...	240 19 41.50	+ 1.63	-31.10	+ 26.96	+14 38 18.84
		W	...	4 31 21.0	3 6.5	40.60	49.80	...	191 45 29.50	+ 6.01	+34.73	- 26.96	
4	π ⁴ Orionis	W	...	4 43 4.0	2 52.3	38.90	49.25	...	182 33 50.05	+ 5.15	+22.73	- 39.53	+ 5 26 12.42
		E	...	4 49 3.0	3 6.7	33.00	45.05	...	249 31 32.75	+ 1.37	-26.69	+ 39.54	
5	18 Camelop.	W	...	5 22 34.0	1 36.6	39.60	49.15	...	234 16 21.38	+ 5.63	- 6.86	+ 19.72	+57 9 14.44
		E	...	5 26 40.0	2 35.4	32.80	45.00	...	197 48 44.90	+ 1.45	+17.76	- 19.73	
6	23 Camelop.	E	...	5 32 28.0	2 40.8	33.15	45.10	...	193 32 24.00	+ 1.68	+13.71	- 24.81	+61 25 44.88
		W	...	5 37 57.0	2 48.2	40.40	49.70	...	238 32 55.10	+ 6.03	-15.00	+ 24.82	
7	99 B. Camelop.	W	...	5 49 15.0	2 55.9	39.55	49.55	...	244 0 38.60	+ 5.75	-10.99	+ 31.81	+66 53 38.94
		E	...	5 55 14.0	3 3.1	32.35	44.95	...	188 4 39.28	+ 1.31	+11.90	- 31.81	
8	74 G. Columbæ	E	...	6 0 17.0	1 58.6	32.35	44.90	...	284 40 41.70	+ 1.28	- 5.56	+2 32.13	-29 45 11.24
		W	...	6 5 50.0	3 34.4	40.55	49.85	...	147 24 21.38	+ 6.26	+18.18	-2 32.14	
9	7 Monocerotis	W	...	6 12 15.0	2 41.7	39.30	49.00	...	169 20 55.70	+ 5.35	+15.10	-1 3.53	- 7 47 12.78
		E	...	6 17 50.0	2 53.3	31.55	44.50	...	262 44 24.50	+ 0.90	-17.35	+1 3.54	
10	13 Monocerotis	E	...	6 24 37.0	2 56.9	32.60	44.90	...	247 33 44.35	+ 1.14	-25.20	+ 36.76	+ 7 24 1.30
		W	...	6 30 36.0	3 2.1	39.85	49.30	...	184 31 30.78	+ 5.54	+26.70	- 36.76	
11	258 G. Canis Majoris.	W	...	6 52 12.0	2 19.8	39.45	49.35	...	151 51 57.90	+ 5.35	+ 8.33	-2 3.53	-25 17 15.82
	February 6, E.	E	...	6 57 18.0	2 46.2	32.10	44.65	...	280 13 20.35	+ 0.95	-11.77	+2 3.55	
12	α ⁴ Eridani	W	...	4 11 19.0	2 45.4	53.55	56.25	...	143 7 55.22	+ 3.36	+10.06	-3 12.20	-34 2 26.28
		E	...	4 18 51.0	4 46.6	49.20	53.55	...	288 57 39.58	+ 0.77	-30.21	+3 12.20	
13	258 G. Eridani	E	...	4 33 39.0	2 17.0	50.30	53.95	...	279 36 42.12	+ 1.49	- 8.08	+2 0.11	-24 40 38.68
		W	...	4 38 23.0	2 27.0	54.30	56.50	...	152 28 31.72	+ 3.99	+ 9.30	-2 0.12	
14	α ¹ Orionis	W	...	4 44 3.0	2 51.3	53.20	55.95	...	191 12 30.72	+ 3.39	+28.75	- 27.70	+14 5 11.84
		E	...	4 49 57.0	3 2.7	50.00	53.90	...	240 52 48.52	+ 1.36	-32.70	+ 27.71	
15	157 H ¹ . Cephei	E	...	4 55 8.0	2 18.5	50.45	54.20	...	169 8 46.60	+ 1.64	+ 0.81	-1 3.83	+85 50 11.19
		W	...	5 0 0.0	2 33.5	53.45	55.95	...	262 56 27.90	+ 3.47	- 1.00	+1 3.83	
16	α Columbæ	W	...	5 11 31.0	2 19.6	53.00	55.80	...	142 10 52.42	+ 3.19	+ 7.05	-3 23.98	-34 59 45.01
		E	...	5 16 14.0	2 23.4	48.45	53.35	...	289 54 24.85	+ 0.69	- 7.44	+3 24.00	
17	18 Camelop.	E	...	5 21 34.0	2 34.2	49.90	53.60	...	197 48 43.40	+ 1.20	+17.49	- 19.70	+57 9 13.84
		W	...	5 26 43.0	2 34.8	53.55	56.00	...	234 16 31.08	+ 3.52	-17.63	+ 19.70	
18	ζ Orionis	W	...	5 33 5.0	2 38.6	53.00	55.50	...	175 8 4.62	+ 3.19	+16.29	- 51.81	- 1 59 52.26
		E	...	5 38 32.0	2 48.4	49.35	53.55	...	256 57 15.85	+ 0.89	-18.36	+ 51.82	
19	99 B. Camelop.	E	...	5 49 14.0	2 54.6	50.05	53.85	...	188 4 37.95	+ 1.37	+10.82	- 31.76	+66 53 39.63
		W	...	5 55 5.0	2 56.4	53.50	55.60	...	244 0 40.25	+ 3.28	-11.05	+ 31.76	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>									<i>° ' "</i>	<i>"</i>
4 7 8	41.8	...	...								1	216 2 40.08	...
4 7 16	...	43.0	29.226								2	41.01	...
5 4 11	33.8	35.0	29.776								3	41.14	+ 7.38
4 4 28	33.1	...	...								4	42.68	+11.03
4 4 40	32.9	...	...								5	42.12	- 1.90
5 5 7	...	34.0	29.794								6	42.76	- 2.13
5 5 25	32.3	...	...								7	42.92	- 1.97
5 5 43	32.3	33.5	29.798								8	41.62	+20.58
5 5 52	32.1	...	...								9	42.10	...
6 6 3	32.0	...	...								10	41.66	+13.60
6 6 12	31.9	33.0	29.792								11	40.56	+19.16
6 6 28	31.8	...	...								12	39.42	...
6 6 55	31.4	...	...								13	40.26	+19.36
7 7 2	...	32.5	29.823								14	40.02	+ 8.41
8 4 15	36.8	...	...								15	39.71	- 9.35
4 4 24	...	38.0	30.016								16	40.39	...
4 4 36	35.2	...	...								17	39.53	- 2.04
4 4 47	36.2	37.5	30.027								18	41.24	...
4 4 58	36.7	...	...								19	41.31	- 2.12
5 5 14	36.9	...	...								
5 5 24	36.9	...	...								
5 5 46	36.6	...	...								
5 5 44	...	37.5	30.042										
5 5 50	...	...	...							

Notes

5. Hurried.
12. Clouds.
12-19. Clock corrections uncertain by 1".
13 W. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	74 G. Columbæ	W		6 0 12.0	2 1.3	52.50	55.50		147 24 35.18	+ 2.94	+ 5.82	-2 32.05	-29 45 12.46
		E		0 4 1.0	1 47.7	49.05	53.65		284 40 41.60	+ 1.14	+ 4.50	+2 32.05	
2	7 Monocerotis	E		6 11 59.0	2 55.4	50.65	54.05		262 44 21.78	+ 1.71	-17.77	+1 3.54	- 7 47 12.46
		W		0 17 54.0	2 59.6	53.00	56.20		169 20 52.30	+ 3.50	+18.03	-1 3.54	
3	2 Canis Majoris	W		6 22 49.0	1 37.3	52.85	55.70		144 38 45.68	+ 3.11	+ 3.57	-2 56.25	-32 31 27.78
	February 9, E.	E		0 26 22.0	1 55.7	49.05	53.85		287 26 32.60	+ 1.27	+ 5.05	+2 56.26	
4	2 Eridani	E		4 29 13.0	2 21.7	50.40	52.35		285 41 20.35	+ 0.22	+ 7.81	+2 40.50	-30 45 58.02
		W		4 34 15.0	2 40.3	54.05	55.00		146 23 51.08	+ 2.67	+ 0.90	-2 40.51	
5	π ¹ Orionis	W		4 46 59.0	2 22.8	53.15	53.90		187 7 15.75	+ 1.84	+17.62	+ 33.21	+ 9 59 38.60
		E		4 52 1.0	2 39.2	50.50	52.40		244 58 6.32	+ 0.57	-21.80	+ 33.21	
6	6 Columbæ	E		5 11 26.0	2 21.3	50.55	52.50		289 54 23.20	+ 0.57	- 7.22	+3 25.26	-34 59 45.96
		W		5 16 28.0	2 40.7	55.10	55.30		142 10 40.22	+ 3.21	+ 9.34	-3 25.27	
7	18 Camelop.	W		5 21 45.0	2 20.0	54.60	54.55		234 16 27.08	+ 2.80	-14.42	+ 19.84	+57 9 13.73
		E		5 26 41.0	2 36.0	51.15	52.75		197 48 42.38	+ 0.80	+17.90	- 19.84	
8	5 Orionis	E		5 33 18.0	2 22.4	51.30	53.35		256 57 7.05	+ 1.04	-13.13	+ 52.17	- 1 59 51.31
		W		5 38 17.0	2 36.6	54.95	55.00		175 8 4.18	+ 3.22	+15.88	- 52.17	
9	2 Orionis	W		5 54 29.0	2 22.5	52.95	53.95		186 46 17.80	+ 2.05	+17.37	+ 33.78	+ 9 38 39.10
		E		5 59 24.0	2 32.5	51.20	53.30		245 10 3.78	+ 0.99	-19.90	+ 33.78	
10	Groombridge 1004	E		6 6 50.0	2 36.3	52.05	53.45		168 13 23.10	+ 1.24	+ 0.79	-1 6.42	+86 45 37.38
		W		6 11 50.0	2 28.7	54.95	54.90		263 51 51.58	+ 2.72	+ 0.67	-1 6.43	
11	6 Lynceis	W		6 19 55.0	2 11.0	54.50	54.70		235 21 12.18	+ 2.65	-11.50	+ 21.14	+58 14 1.49
		E		6 24 47.0	2 41.0	51.05	52.05		196 43 57.88	+ 0.55	+17.51	+ 21.14	
12	8 Canis Majoris	E		6 43 40.0	2 16.0	51.60	53.10		287 19 10.30	+ 0.99	- 7.00	+2 56.21	-32 24 4.30
		W		6 48 40.0	2 44.0	55.00	54.85		144 46 1.38	+ 3.17	+10.17	-2 56.22	
13	22 Canis Majoris	W		6 55 18.0	2 16.3	53.75	54.60		149 21 28.28	+ 2.30	+ 7.59	-2 19.32	-27 48 3.68
		E		7 0 17.0	2 42.7	50.50	53.15		282 43 50.58	+ 0.51	-10.82	+2 19.33	
14	18 Lynceis	E		7 4 53.0	2 18.3	52.10	53.70		195 9 30.88	+ 1.34	+11.45	- 23.07	+59 48 34.53
	February 12, E.	W		7 9 51.0	2 39.7	55.00	55.10		236 55 45.58	+ 2.86	-15.26	+ 23.08	
15	π ¹ Orionis	E		4 46 49.0	2 25.5	47.65	51.70		244 58 3.10	+ 2.11	-18.20	+ 31.79	+ 9 59 38.04
		W		4 51 44.0	2 29.5	52.10	54.30		187 7 9.30	+ 4.55	+19.31	- 31.79	
16	157 H ¹ Cephei	W		4 55 4.0	2 10.6	51.00	51.80		262 56 30.75	+ 4.08	- 0.72	+1 1.46	+85 50 12.57
		E		4 59 53.0	2 38.4	45.70	51.05		169 8 43.15	+ 1.09	+ 1.06	-1 1.46	
17	2 Leporis	E		5 12 16.0	2 31.5	46.60	51.00		268 13 45.85	+ 1.16	-11.99	+1 14.11	-13 16 52.99
		W		5 17 18.0	2 30.5	51.50	54.10		163 51 27.80	+ 4.21	+11.84	-1 14.11	
18	19 Camelop.	W		5 25 0.0	2 34.9	49.40	52.90		241 12 39.02	+ 3.14	-10.42	+ 27.11	+64 5 35.37
		E		5 30 5.0	2 20.4	45.45	50.70		190 52 37.92	+ 0.85	+ 0.86	-27.11	

Time.	Ther- m.	At- ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point	Red. to 1903 B.
2 4 m	8	8	in				
2 6 2	16.0				1	216 2 41.04	+20.80
2 8 2	16.4				2	40 10	
2 10 2	16.0				3	30 50	+20.86
2 12 2		17.0	30.021		4	45 34	+20.91
2 14 2	14.7				5	40 10	+9.88
2 16 2	14.19	16.0	30.019		6	19 16	
2 18 2	13.8				7	45 17	+2.41
2 20 2	13.5	15.0	29.998		8	19 12	
2 22 2	13.5				9	41 01	+12.18
2 24 2	13.7				10	39 18	-4.58
2 26 2	13.9				11	39 39	+1.15
2 28 2	14.1	15.0	30.014		12	39 30	+1.01
2 30 2	14.2				13	39 24	+2.24
2 32 2	14.0				14	45 43	+4.11
2 34 2	14.4	14.5	30.005		15	40 04	+1.90
2 36 2	14.8	14.5	30.000		16	39 11	-5.93
2 38 2	15.0				17	40 44	+1.00
2 40 2	15.5	15.4	30.004		18	40 18	+4.11
2 42 2	15.2						
2 44 2	15.0						
2 46 2	15.0						
2 48 2	15.0						

Notes.
 1-8. Clock correction uncertain by 1".
 9-16. One level reading decreased 1 day.
 17-18. One level reading decreased 10 days.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	ξ Aurigæ	W	...	5 43 55.0	2 30.5	50.50	53.15	.....	232 48 26.65	+ 3.63	-18.78	+ 17.42	+55 41 6.45
		E	...	5 48 53.0	2 27.5	45.20	50.20	.....	199 16 48.32	+ 0.51	+18.04	- 17.42	
2	μ Orionis	E	...	5 54 13.0	2 31.3	45.95	50.75	.....	245 19 3.35	+ 0.95	-19.59	+ 32.41	+ 9 38 38.01
		W	...	5 59 17.0	2 32.7	50.90	53.45	.....	186 46 8.22	+ 3.96	+19.95	- 32.41	
3	Groombridge 1004	W	...	6 6 30.0	2 54.2	49.60	52.60	.....	263 51 55.10	+ 2.82	- 0.98	+1 3.82	+86 45 38.25
		E	...	6 11 33.0	2 8.8	45.70	50.40	.....	168 13 20.28	+ 0.67	+ 0.54	-1 3.82	
4	χ Draconis s. p.	E	...	6 20 2.0	2 23.1	45.35	49.50	.....	147 41 46.80	+ 0.05	- 2.78	-2 24.98	+72 41 21.07
		W	...	6 24 54.0	2 28.9	50.85	53.95	.....	284 23 30.38	+ 3.94	+ 3.01	+2 24.99	
5	156 H ¹ . Draconis s. p.	E	...	6 31 28.0	2 33.4	45.35	49.95	.....	152 28 6.30	+ 0.56	- 2.41	-1 56.21	+77 28 14.08
		W	...	6 36 25.0	2 23.6	51.70	54.60	.....	279 37 3.75	+ 4.59	+ 2.11	+1 56.21	
6	κ Canis Majoris	W	...	6 43 31.0	2 23.7	50.55	53.50	.....	144 45 52.95	+ 3.56	+ 7.81	-2 49.41	-32 24 6.95
		E	...	6 48 22.0	2 27.3	45.80	50.45	.....	287 19 20.32	+ 0.72	- 8.21	+2 49.41	
7	h Geminorum	E	...	6 54 32.0	2 30.5	46.60	50.75	.....	225 28 46.60	+ 1.21	-51.11	+ 9.64	+29 29 50.84
		W	...	6 59 32.0	2 29.5	52.30	53.75	.....	206 36 29.35	+ 4.46	+50.43	- 9.64	
8	22 Monocerotis	W	...	7 4 17.0	2 19.3	50.35	53.20	.....	176 47 42.98	+ 3.38	+13.01	- 47.41	- 0 20 11.11
		E	...	7 9 13.0	2 30.7	45.90	50.45	.....	255 17 35.95	+ 0.70	-16.47	+ 47.41	
9	March 3, E. δ Ursæ Minoris s. p.	E	...	6 1 4.0	2 16.5	47.35	49.05	.....	161 35 55.58	+ 3.21	- 0.57	-1 22.72	+86 36 39.41
		W	...	6 6 2.0	2 41.5	44.20	46.55	.....	270 29 18.45	+ 1.22	+ 0.80	+1 22.70	
10	ζ Canis Majoris	W	...	6 14 12.0	2 23.7	43.30	46.10	.....	147 8 10.02	+ 1.07	+ 8.13	-2 32.49	-30 1 36.87
		E	...	6 18 58.0	2 22.3	47.80	49.20	.....	284 57 5.80	+ 3.66	- 7.97	+2 32.49	
11	156 H ¹ . Draconis s. p.	E	...	6 31 56.0	2 26.4	46.85	48.70	.....	152 28 2.72	+ 3.46	- 2.20	-1 58.86	+77 28 9.20
		W	...	6 36 57.0	2 34.6	43.85	46.85	.....	279 37 10.60	+ 1.30	+ 2.45	+1 58.87	
12	κ Canis Majoris	W	...	6 43 47.0	2 26.5	43.15	46.15	.....	144 45 58.52	+ 0.50	+ 8.12	-2 53.46	-32 24 9.49
		E	...	6 48 45.0	2 31.5	47.05	48.85	.....	287 19 18.18	+ 3.20	- 8.68	+2 53.47	
13	51 H. Cephei	E	...	6 53 13.0	2 18.7	47.45	48.95	.....	167 46 47.08	+ 3.54	+ 0.53	-1 6.53	+87 12 11.40
		W	...	6 57 30.0	1 58.3	43.65	46.05	.....	264 18 26.88	+ 1.07	- 0.39	+1 6.53	
14	25 H. Camelop.	W	...	7 8 13.0	2 36.7	43.55	46.00	.....	259 42 28.80	+ 1.01	- 1.94	+ 56.70	+82 36 1.64
		E	...	7 13 9.0	2 19.3	46.85	48.75	.....	172 22 46.70	+ 3.26	+ 1.53	- 56.70	
15	6 Canis Minoris	E	...	7 21 53.0	2 31.6	46.70	48.15	.....	242 45 33.05	+ 2.69	-21.21	+ 29.92	+12 12 9.27
		W	...	7 27 13.0	2 48.4	43.30	45.90	.....	189 19 32.68	+ 0.56	+26.16	- 29.92	
16	f Puppis	W	...	7 31 58.0	1 49.5	42.50	45.40	.....	142 25 14.78	+ 0.16	+ 4.36	-3 19.97	-34 45 24.08
		E	...	7 36 15.0	2 27.5	44.60	47.25	.....	289 40 6.85	+ 2.05	- 7.90	+3 19.99	
17	ξ Argûs	E	...	7 42 47.0	2 26.6	45.35	47.40	.....	279 33 24.32	+ 1.95	- 9.26	+1 58.93	-24 37 19.15
		W	...	7 47 40.0	2 26.4	43.40	46.00	.....	152 31 53.32	+ 0.52	+ 9.23	-1 58.93	
18	4 B. Ursæ Minoris	W	...	7 58 49.0	3 22.3	42.45	45.40	.....	266 1 44.60	0.00	- 0.42	+1 10.83	+88 55 31.51
		E	...	8 3 49.0	1 37.7	45.05	47.50	.....	166 3 34.35	+ 1.86	+ 0.10	-1 10.83	
19	58 Camelop.	E	...	8 10 5.0	2 32.7	45.05	47.50	.....	196 55 18.72	+ 1.94	+15.98	- 20.65	+58 2 39.67
		W	...	8 15 7.0	2 29.3	43.10	45.65	.....	235 9 56.20	+ 0.26	-15.28	+ 20.64	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1903 O.
<i>d h m</i>	<i>"</i>	<i>°</i>	<i>in.</i>							<i>° / "</i>	
12 5 46	49.1	52.0	29.799						1	210 2 39.18	
5 57	48.9	...	...						2	38.42	+12.30
0 9	48.5	...	...						3	39.22	- 5.35
6 22	47.8	51.0	29.795						4	40.70	
6 34	47.4	...	...						5	37.45	+ 4.89
6 46	47.7	...	...						6	38.58	+21.52
6 57	47.3	...	...						7	40.47	+ 0.59
7 7	46.9	...	...						8	39.78	
7 13	...	49.0	29.788						9	39.34	
8 4	44.7	47.0	30.259						10	40.36	
6 17	44.6	...	...						11	39.17	+ 8.90
6 27	...	46.5	30.250						12	39.92	+24.64
6 34	43.9	...	...						13	39.36	
6 46	43.7	...	...						14	39.68	
6 55	43.2	...	...						15	36.96	+14.44
7 10	42.9	...	...						16	40.16	+24.31
7 17	...	45.0	30.248						17	40.04	
7 25	42.7	...	...						18	40.24	
7 34	42.4	...	...						19	38.90	+ 4.45
7 45	42.3	...	...						
8 1	42.2	45.0	30.254								
8 11	42.2	...	...						

Note.

1-8. Clock corrections uncertain by 1".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	20 Cancri	W	...	8 20 43.0	2 30.4	42.15	45.40		191 39 6.88	+ 0.10	+ 22.50	- 27.01	+14 31 40.33
	March 4, E.	E	...	8 25 44.0	2 30.6	44.90	47.55		240 26 8.58	+ 2.28	- 22.56	+ 27.01	
2	δ Ursæ Minoris S.P.	W	...	6 1 3.0	2 19.2	46.75	48.20		270 29 19.95	+ 2.21	+ 0.60	+1 21.15	+86 36 40.45
		E	...	6 6 3.0	2 40.8	51.15	51.35		161 35 55.35	+ 4.89	- 0.79	+1 21.15	
3	γ Canis Majoris	E	...	6 14 5.0	2 32.0	51.00	51.50		284 57 7.30	+ 5.19	+ 0.10	+2 29.71	-30 1 30.03
		W	...	6 19 5.0	2 28.0	46.45	48.10		147 8 6.12	+ 2.49	+ 8.62	-2 29.70	
4	13 Monocerotis	W	...	6 25 6.0	2 35.5	45.15	47.65		184 31 40.38	+ 1.35	+ 19.47	- 35.67	+ 7 24 0.90
		E	...	6 30 6.0	2 24.5	50.25	50.85		247 33 33.88	+ 4.49	+ 16.81	+ 35.67	
5	γ Canis Majoris	W	...	6 49 18.0	2 32.6	43.30	46.20		160 12 36.95	+ 0.42	+ 11.42	-1 25.55	-16 56 3.03
		E	...	6 54 22.0	2 31.4	47.85	49.45		271 52 45.12	+ 3.35	+ 11.24	+1 25.57	
6	45 Geminorum	E	...	7 0 18.0	2 32.4	49.15	50.05		238 52 57.48	+ 3.96	+ 24.39	+ 24.55	+16 4 56.56
		W	...	7 5 18.0	2 27.6	44.65	46.90		193 12 21.62	+ 1.27	+ 22.88	- 24.55	
7	20 Canis Majoris	W	...	7 12 10.0	2 30.0	44.25	46.55		152 45 54.92	+ 0.46	+ 9.73	-1 55.44	-24 23 14.97
		E	...	7 17 8.0	2 28.0	48.80	50.55		279 19 23.42	+ 3.72	+ 9.48	+1 55.45	
8	6 Canis Minoris	W	...	7 21 55.0	2 31.0	44.25	46.90		189 19 42.90	+ 0.70	+ 21.04	- 29.33	+12 12 11.13
		E	...	7 26 54.0	2 28.0	49.65	50.50		242 45 33.58	+ 4.15	+ 20.21	+ 29.33	
9	26 Monocerotis	E	...	7 34 7.0	2 31.0	50.15	50.85		264 16 48.80	+ 4.71	+ 12.95	+1 5.37	- 9 19 48.63
		W	...	7 39 8.0	2 29.1	45.40	47.45		167 48 26.32	+ 1.73	+ 12.48	-1 5.37	
10	9 Puppis	W	...	7 45 31.0	1 48.0	44.15	46.80		163 29 47.90	+ 0.59	+ 6.06	-1 16.14	-13 38 46.11
		E	...	7 49 2.0	1 43.0	48.95	50.45		268 35 29.58	+ 3.92	+ 5.51	+1 16.14	
11	4 B. Ursæ Minoris	E	...	7 59 0.0	3 12.0	50.60	51.05		166 3 32.52	+ 4.71	+ 0.38	-1 9.49	+88 55 30.41
		W	...	8 3 54.0	1 42.0	44.65	47.10		266 1 45.20	+ 0.90	+ 0.11	+1 9.46	
12	58 Camelop.	W	...	8 10 7.0	2 32.3	44.60	47.15		235 9 58.62	+ 0.83	+ 15.90	+ 20.26	+58 2 40.48
		E	...	8 15 5.0	2 25.7	49.75	50.90		196 55 17.60	+ 4.45	+ 14.55	- 20.25	
13	29 Cancri	E	...	8 20 44.0	2 31.0	50.60	51.10		240 26 8.02	+ 5.20	- 22.68	+ 26.45	+14 31 39.25
	March 12, E.	W	...	8 25 43.0	2 28.0	45.30	47.35		191 39 5.22	+ 1.44	+ 21.79	- 26.45	
14	ε Geminorum	W	...	6 46 41.0	2 30.0	50.10	47.90		190 25 24.52	+ 0.71	+ 21.48	- 27.84	+13 17 51.95
		E	...	6 51 42.0	2 31.0	54.15	50.10		241 39 59.58	+ 2.86	+ 21.77	+ 27.84	
15	45 Geminorum	E	...	7 0 19.0	2 30.1	55.55	51.05		238 52 59.25	+ 4.02	+ 23.66	+ 24.49	+16 4 56.07
		W	...	7 5 19.0	2 30.0	54.55	50.50		193 12 21.12	+ 3.63	+ 23.63	- 24.49	
16	λ Ursæ Minoris S.P.	W	...	7 16 41.0	1 37.5	53.40	49.80		268 6 38.30	+ 2.86	+ 0.10	+1 14.59	+88 50 30.79
		E	...	7 21 29.0	3 10.5	55.40	50.85		163 58 41.98	+ 3.96	+ 0.37	+1 14.59	
17	ε Geminorum	E	...	7 30 19.5	2 31.7	57.50	52.50		220 11 24.50	+ 5.21	+ 51.30	+ 4.23	+34 48 17.01
		W	...	7 35 25.0	2 33.0	55.90	51.50		211 53 48.68	+ 4.12	+ 54.55	+ 4.23	
18	9 Puppis	W	...	7 44 47.0	2 30.5	53.40	49.75		163 29 41.38	+ 2.54	+ 11.76	-1 15.98	-13 38 40.92
		E	...	7 49 49.0	2 31.5	55.25	51.30		268 35 39.15	+ 3.87	+ 11.92	+1 15.98	
19	ε Cancri	E	...	7 59 35.0	2 29.3	57.65	52.70		233 6 30.22	+ 5.61	+ 29.92	+ 17.94	+21 51 35.56
		W	...	8 4 34.0	2 29.8	56.00	51.05		198 58 45.02	+ 4.23	+ 30.12	+ 17.94	

Time	Ther- m.	Air ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
1	41.9	44.0	30.109					1	41.10	+14.96
2	41.6	41.5	30.109					2	41.10	
3	41.1	41.0	30.109					3	41.10	
4	40.9	40.9	30.109					4	41.02	+14.57
5	40.7	40.7	30.109					5	41.02	+14.57
6	40.7	40.7	30.109					6	41.02	+14.57
7	40.7	40.7	30.109					7	41.02	+14.57
8	40.7	40.7	30.109					8	41.02	+14.57
9	40.7	40.7	30.109					9	41.02	+14.57
10	40.7	40.7	30.109					10	41.02	+14.57
11	40.7	40.7	30.109					11	41.02	+14.57
12	40.7	40.7	30.109					12	41.02	+14.57
13	40.7	40.7	30.109					13	41.02	+14.57
14	40.7	40.7	30.109					14	41.02	+14.57
15	40.7	40.7	30.109					15	41.02	+14.57
16	40.7	40.7	30.109					16	41.02	+14.57
17	40.7	40.7	30.109					17	41.02	+14.57
18	40.7	40.7	30.109					18	41.02	+14.57
19	40.7	40.7	30.109					19	41.02	+14.57

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	γ Cancri	W	...	8 11 43.0	2 28.3	53.55	50.45	...	204 38 36.45	+ 3.23	+ 41.88	- 11.79	+27 31 42.68
		E	...	8 16 42.0	2 30.7	57.00	52.40	...	227 26 44.22	+ 5.19	- 43.25	+ 11.79	
2	Groombridge 1418	E	...	8 23 57.0	2 24.4	58.30	53.05	...	169 35 2.15	+ 5.83	+ 0.98	- 1 1.49	+85 23 53.38
		W	...	8 28 54.0	2 32.6	56.05	51.20	...	262 30 15.85	+ 4.44	- 1.09	+ 1 1.49	
3	β Pyxidis	W	...	8 33 51.0	2 28.2	55.70	51.15	...	142 12 22.18	+ 4.30	+ 7.95	- 3 19.14	-34 58 12.07
		E	...	8 38 53.0	2 33.8	56.80	52.25	...	289 52 57.38	+ 5.00	- 8.56	+ 3 19.15	
4	76 Draconis S. P.	E	...	8 47 17.0	2 14.3	57.90	52.65	...	157 9 50.98	+ 5.28	- 1.22	- 1 36.64	+82 10 18.61
		W	...	8 52 7.0	2 35.7	57.05	51.90	...	274 55 24.58	+ 4.79	+ 1.64	+ 1 36.64	
5	h Mali	W	...	9 14 43.0	2 29.7	56.40	51.40	...	151 35 45.88	+ 4.25	+ 9.51	- 2 1.92	-25 33 28.54
		E	...	9 19 43.0	2 30.3	57.50	52.55	...	280 29 30.80	+ 5.21	- 9.58	+ 2 1.91	
6	β Cephei S. P.	E	...	9 24 58.0	2 23.6	58.15	52.75	...	145 8 50.90	+ 5.68	- 3.15	- 2 47.57	+70 8 4.75
	March 13, E.	W	...	9 29 59.0	2 37.4	56.50	51.75	...	286 56 26.65	+ 4.82	+ 3.78	+ 2 47.56	
7	γ Draconis S. P.	E	...	6 20 18.0	3 25.0	48.45	52.80	...	147 41 37.95	+ 2.42	- 5.71	- 2 23.07	+72 41 16.18
		W	...	6 25 17.0	1 34.0	49.00	53.00	...	284 23 38.72	+ 2.68	+ 1.20	+ 2 23.09	
8	51 H. Cephei	W	...	6 52 42.0	2 42.7	47.80	52.20	...	264 18 30.08	+ 2.19	- 0.73	+ 1 4.25	+87 12 12.38
		E	...	6 58 16.0	2 51.3	49.05	53.10	...	167 46 45.08	+ 2.95	+ 0.81	- 1 4.27	
9	22 Monocerotis	E	...	7 4 34.0	2 17.9	49.15	53.25	...	255 17 32.60	+ 2.88	- 12.76	+ 46.92	- 0 20 12.77
		W	...	7 9 34.0	2 42.1	49.20	52.50	...	176 47 37.35	+ 2.51	+ 17.62	- 46.92	
10	η Canis Majoris	E	...	7 17 48.0	2 24.8	47.10	52.15	...	284 2 55.02	+ 1.86	- 8.38	+ 2 21.44	-29 7 12.81
		W	...	7 22 46.0	2 33.2	45.65	52.55	...	148 2 21.12	+ 1.73	+ 9.38	- 2 21.44	
11	α Geminorum	W	...	7 30 22.0	2 25.7	45.00	50.75	...	211 54 3.12	+ 0.73	+ 42.73	- 4.17	+34 48 18.23
		E	...	7 35 22.0	2 34.3	46.95	52.10	...	220 11 28.80	+ 1.66	- 1 55.16	+ 4.18	
12	ξ Argus	W	...	7 42 45.0	2 25.3	47.50	52.25	...	152 31 46.88	+ 1.83	+ 9.10	- 1 55.15	-24 37 21.12
		E	...	7 47 44.0	2 33.7	48.10	52.50	...	279 33 31.28	+ 2.19	- 10.18	+ 1 55.15	
13	γ Cancri	E	...	8 11 40.0	2 28.1	50.25	53.30	...	227 26 40.30	+ 3.44	- 41.76	+ 11.66	+27 31 43.59
		W	...	8 16 42.0	2 33.9	49.35	52.40	...	204 38 31.08	+ 2.76	+ 45.10	- 11.66	
14	Groombridge 1418	W	...	8 23 53.0	2 25.0	47.05	51.50	...	262 30 17.58	+ 1.67	- 0.99	+ 1 0.79	+85 23 54.23
		E	...	8 28 53.0	2 35.0	48.85	53.00	...	169 35 1.00	+ 2.80	+ 1.13	- 1 0.79	
15	β Pyxidis	E	...	8 33 52.0	2 24.1	49.35	53.20	...	289 52 58.18	+ 3.05	- 7.51	+ 3 17.03	-34 58 13.21
		W	...	8 38 52.0	2 35.9	49.10	52.55	...	142 12 16.20	+ 2.82	+ 8.80	- 3 17.02	
16	76 Draconis S. P.	W	...	8 47 8.0	2 20.3	48.10	52.50	...	274 55 28.35	+ 2.20	+ 1.33	+ 1 35.61	+82 10 16.95
		E	...	8 52 7.0	2 38.7	48.25	52.25	...	157 9 50.18	+ 2.05	- 1.70	- 1 35.61	
17	ω Hydræ	E	...	8 58 23.0	2 26.7	49.10	53.00	...	249 29 0.58	+ 2.87	- 16.49	+ 38.23	+ 5 28 32.17
		W	...	9 3 22.0	2 32.3	49.05	52.25	...	182 36 13.78	+ 2.67	+ 17.77	- 38.23	
18	h Mali	E	...	9 14 33.0	2 36.7	48.85	52.95	...	280 29 33.45	+ 2.64	- 10.42	+ 2 0.70	-25 33 29.45
	March 14, E.	W	...	9 19 33.0	2 23.3	49.55	53.10	...	151 35 43.05	+ 2.88	+ 8.71	- 2 0.70	
19	6 Canis Minoris	W	...	7 21 54.0	2 26.5	47.40	52.65	...	189 19 41.72	+ 2.35	+ 19.80	- 28.70	+12 12 11.41
		E	...	7 26 54.0	2 33.5	47.15	52.25	...	242 45 36.82	+ 2.11	- 21.74	+ 28.70	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
12 8 14	47.9	...	...				1	216 2 43.86	+ 11.11
8 26	47.5	...	...				2	44.08	2.05
8 36	47.7	...	...				3	44.13	+ 24.09
8 50	47.3	...	...				4	43.02	...
8 56	...	49.5	30.047				5	43.03	...
9 17	46.7	49.0	30.038				6	44.34	...
9 27	46.6	...	...				7	38.64	...
13 6 23	57.5	...	...				8	40.18	...
6 29	...	59.0	29.996				9	40.10	...
6 55	56.0	...	...				10	40.36	+ 24.99
7 7	55.3	56.0	30.006				11	40.94	+ 7.52
7 20	54.9	...	...				12	40.55	...
7 33	54.1	...	...				13	40.46	+ 11.01
7 45	54.0	...	...				14	41.60	- 2.29
7 52	...	56.0	30.008				15	40.78	+ 24.25
8 14	52.7	...	...				16	41.20	...
8 26	52.4	...	...				17	40.59	+ 17.20
8 36	52.0	...	...				18	40.16	...
8 43	...	55.0	30.002				19	40.53	+ 14.36
8 50	51.7	...	...				
9 1	51.6	...	...				
9 17	51.0	...	...				
9 21	...	53.5	30.005						
14 7 24	58.7	60.5	29.982						

Notes.
14 E. One microscope reading increased 10".
19. Hazy; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	4 Puppis	E		7 30 1.0	2 24.5	48.50	53.45		260 16 50.18	+ 3.31	-10.72	+1 16.35	-14 20 1.65
		W		7 43 57.0	2 31.5	48.95	53.40		162 48 23.32	+ 3.53	+11.78	-1 16.35	
2	μ Cancri	W		7 50 35.0	2 25.3	48.25	53.00		198 58 46.42	+ 3.04	+28.34	- 17.56	+21 51 36.05
		E		8 4 33.0	2 32.7	47.15	52.05		233 6 33.12	+ 2.29	-31.30	+ 17.57	
3	d^1 Cancri	E		8 15 20.0	2 25.5	47.15	52.15		236 19 33.40	+ 2.08	-24.56	+ 21.16	+18 38 25.06
		W		8 20 21.0	2 35.5	49.90	54.10		195 45 37.92	+ 3.85	+28.05	- 21.16	
4	ρ^1 Cancri	W		8 44 21.0	2 25.4	44.00	50.10		205 48 42.65	+ 0.34	+44.32	- 10.37	+28 41 52.75
		E		8 49 19.0	2 32.6	45.60	51.55		226 16 41.90	+ 1.53	-48.81	+ 10.37	
5	ϵ Cancri	E		8 54 41.0	2 20.1	47.40	52.05		230 8 19.72	+ 2.43	-31.04	+ 14.42	+24 49 52.26
		W		8 59 27.0	2 25.9	48.60	52.40		201 56 54.45	+ 2.82	+33.66	- 14.42	
6	1 H. Draconis	W		9 20 45.0	2 35.2	45.85	51.00		258 51 49.28	+ 1.05	- 2.16	+ 53.21	+81 45 17.24
		E		9 25 50.0	2 29.8	46.35	52.10		173 13 29.82	+ 1.82	+ 2.01	- 53.21	
7	22 March 17, E. Canis Majoris	W		6 55 25.0	2 21.1	47.75	48.70		149 21 19.58	+ 0.35	+ 8.14	-2 12.39	-27 48 9.59
		E		7 0 53.0	3 6.9	52.90	51.95		282 44 6.40	+ 3.87	-14.27	+2 12.42	
8	18 Lynceis	E		7 5 21.0	2 1.7	53.30	52.30		105 9 26.28	+ 3.77	+ 8.87	- 21.92	+59 48 39.98
		W		7 9 44.0	2 21.3	49.00	49.35		236 55 52.55	+ 0.89	-11.95	+ 21.92	
9	2 Ursæ Minoris s. p.	E		7 16 37.0	1 41.9	53.00	52.00		163 58 38.12	+ 3.78	- 0.10	-1 13.64	+88 59 30.42
		W		7 21 39.0	3 20.1	49.95	49.85		268 6 37.95	+ 1.80	+ 0.38	+1 13.64	
10	1 Puppis	W		7 37 27.0	2 22.9	49.30	49.10		148 25 47.90	+ 0.90	+ 8.21	-2 18.99	-28 43 45.12
		E		7 42 24.0	2 34.1	53.40	52.45		283 39 28.50	+ 3.87	- 9.55	+2 19.00	
11	3 Cancri	E		7 52 44.0	2 25.1	54.40	52.05		237 23 38.28	+ 4.22	-23.39	+ 22.54	+17 34 15.14
		W		7 57 44.0	2 34.9	50.35	49.85		194 41 32.02	+ 1.05	+26.66	- 22.55	
12	ϕ Cancri	W		8 2 9.0	2 23.0	48.45	49.10		202 55 0.22	+ 0.87	+34.40	- 13.46	+25 47 56.54
		E		8 7 8.0	2 36.0	53.95	52.50		229 10 25.62	+ 4.37	-40.94	+ 13.46	
13	d^1 Cancri	W		8 15 19.0	2 25.0	48.85	49.20		195 45 45.10	+ 0.81	+24.39	- 21.34	+18 38 25.06
		E		8 20 19.0	2 35.0	54.10	52.70		236 19 34.75	+ 4.17	-27.86	+ 21.34	
14	212 H ¹ . Draconis s. p.	E		8 27 53.0	2 24.6	54.65	52.80		147 12 31.42	+ 4.70	- 2.90	-2 27.97	+72 12 7.24
		W		8 33 0.0	2 42.4	49.85	49.80		284 52 43.85	+ 1.71	+ 3.66	+2 27.98	
15	14 Hydræ	W		8 42 2.0	2 22.7	49.05	49.10		174 2 45.65	+ 1.12	+12.89	- 52.00	- 3 5 16.98
		E		8 46 58.0	2 33.3	53.15	52.00		258 2 34.22	+ 3.83	-14.88	+ 52.00	
16	ϵ Cancri	E		8 54 38.0	2 21.5	54.65	53.10		230 8 17.45	+ 4.90	-31.67	+ 14.53	+24 49 52.16
		W		8 59 32.0	2 32.5	49.40	49.40		201 56 52.40	+ 1.34	+36.78	- 14.54	
17	51 March 18, E. H. Cephei	E		6 52 50.0	2 29.6	54.15	53.55		167 46 42.70	+ 5.00	+ 0.62	-1 4.02	+87 12 12.92
		W		6 57 40.0	2 20.4	49.55	50.15		264 18 31.15	+ 1.97	- 0.55	+1 4.02	
18	51 Geminorum	W		7 5 25.0	2 17.3	48.05	49.50		193 26 39.45	+ 1.18	+10.98	- 23.84	+16 19 12.82
		E		7 10 10.0	2 27.7	52.50	52.85		238 38 39.80	+ 4.17	-23.12	+ 23.84	
19	Puppis	E		7 30 21.0	3 20.0	53.40	52.95		289 40 19.62	+ 4.53	-14.53	+3 12.84	-34 45 24.56
		W		7 36 20.0	2 39.0	49.20	50.40		142 25 1.50	+ 1.92	+ 9.18	-3 12.82	

Time	Ther- m	At- ther	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point	Red. to 1901
<i>d h m</i>			<i>in</i>							
14 7 41	57.9		30.0					1	210 2 40.20	+21.00
7 52	57.2		30.0					2	40.96	+12.26
8 15	56.8		30.0					3	40.17	
8 47	56.4		30.0					4	40.96	+11.48
8 57	55.1		30.0					5	41.02	+12.70
9 4			30.0					6	40.91	
9 23	54.9		30.0					7	42.05	+25.14
10 6 50			30.0					8	40.70	- 1.27
6 58	56.1		30.0					9	40.96	
7 8	55.6		30.0					10	40.92	+25.24
7 19	55.4		30.0					11	40.92	+11.34
7 46	54.1		30.0					12	42.22	+11.04
7 47			30.0					13	40.68	
7 55	54.9		30.0					14	41.22	
8 5	54.8		30.0					15	41.42	
8 17	53.1		30.0					16	40.69	+12.02
8 16	54.7		30.0					17	40.44	
8 59			30.0					18	40.71	
8 24	53.1		30.0					19	41.12	+26.48
8 57	53.4		30.0							
9 1			30.0							
18 6 57	60.9		30.0							
7 8	59.9		30.0							
7 22			30.0							
7 31	58.9		30.0							

Notes.
 1st. Heavy clouds.
 2nd. One level reading increased 0.01.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Draconis S. P.	W	...	7 45 50.0	2 31.8	48.00	49.45	.....	287 3 25.15	+ 1.04	+ 3.53	+2 45.47	+70 1 9.62
		E	...	7 51 15.0	2 53.2	52.55	52.25	.....	145 1 54.35	+ 3.71	- 4.00	-2 45.47	
2	ϕ Cancrī	E	...	8 2 10.0	2 21.2	52.25	52.20	.....	220 10 17.55	+ 3.82	-33.54	+ 13.44	+25 47 56.16
		W	...	8 7 3.0	2 31.8	49.35	50.50	.....	202 54 52.68	+ 2.04	+38.76	- 13.45	
3	χ Cancrī	W	...	8 11 38.0	2 27.0	48.50	49.60	.....	204 38 36.88	+ 1.37	+41.15	- 11.63	+27 31 44.01
		E	...	8 16 43.0	2 38.0	52.25	51.75	.....	227 26 45.65	+ 3.55	-47.53	+ 11.64	
4	θ Cancrī	E	...	8 23 35.0	2 23.5	52.20	52.40	.....	236 32 47.65	+ 3.83	-23.66	+ 21.60	+18 25 7.96
		W	...	8 28 32.0	2 33.5	49.25	50.15	.....	195 32 24.40	+ 1.90	+27.08	- 21.60	
5	α Mali	W	...	8 37 14.0	2 22.3	47.05	48.90	.....	144 19 33.25	+ 0.46	+ 7.60	-2 53.22	-32 50 35.12
		E	...	8 42 13.0	2 36.7	52.00	51.80	.....	287 45 44.52	+ 3.36	- 9.22	+2 53.24	
6	B. A. C. 7504 S. P.	W	...	9 16 30.0	2 9.6	47.95	47.95	.....	270 27 53.45	+ 0.23	+ 0.51	+1 20.87	+86 38 9.21
		E	...	9 21 30.0	2 50.4	51.35	51.35	.....	161 37 25.82	+ 2.98	- 0.89	-1 20.87	
7	10 Leonis	E	...	9 29 35.0	2 25.1	52.70	52.40	.....	247 41 36.02	+ 3.88	-16.50	+ 35.81	+ 7 15 58.27
		W	...	9 34 32.0	2 31.9	49.95	50.15	.....	184 23 37.98	+ 1.94	+18.08	- 35.81	
8	23 Leonis	W	...	9 43 21.0	2 20.9	47.45	49.30	.....	190 38 27.62	+ 0.92	+19.10	- 27.63	+13 30 55.86
		E	...	9 48 19.0	2 37.1	51.65	51.60	.....	241 26 54.68	+ 3.26	-23.73	+ 27.63	
9	March 19, E. 29 Canis Majoris	E	...	7 12 10.0	2 22.0	52.75	50.25	.....	279 19 24.05	+ 1.80	- 8.72	+1 54.14	-24 23 16.02
		W	...	7 17 11.0	2 39.0	51.25	49.35	.....	152 45 48.08	+ 0.79	+10.93	-1 54.14	
10	225 B. Draconis S. P.	W	...	7 25 11.0	2 18.9	49.70	48.45	.....	277 41 9.82	+ 0.05	+ 1.71	+1 46.54	+79 24 24.10
		E	...	7 29 58.0	2 28.1	52.20	49.45	.....	154 24 6.80	+ 1.58	- 1.95	-1 46.54	
11	ι Puppis	E	...	7 37 30.0	2 19.0	51.80	49.70	.....	283 39 28.88	+ 1.22	- 7.77	+2 19.27	-28 43 46.32
		W	...	7 42 19.0	2 30.0	51.00	49.10	.....	148 25 45.02	+ 0.60	+ 9.05	-2 19.28	
12	ι Cancrī	W	...	7 49 0.0	2 23.3	49.75	48.05	.....	193 10 10.28	+ 0.14	+21.54	- 24.37	+16 2 44.80
		E	...	7 54 2.0	2 38.7	51.20	49.25	.....	238 55 12.70	+ 0.89	-26.42	+ 24.38	
13	μ Cancrī	E	...	7 59 37.0	2 20.8	51.90	49.85	.....	233 6 25.60	+ 1.59	-26.61	+ 17.73	+21 51 35.66
		W	...	8 4 32.0	2 34.2	50.85	49.00	.....	198 58 41.10	+ 0.79	+31.92	- 17.74	
14	58 Camelop.	W	...	8 10 6.0	2 25.1	49.95	48.40	.....	235 9 57.95	- 0.10	-14.43	+ 20.03	+58 2 42.33
		E	...	8 15 5.0	2 33.9	50.85	49.05	.....	196 55 15.48	+ 0.67	+16.24	- 20.04	
15	θ Cancrī	E	...	8 23 33.0	2 25.4	51.85	49.70	.....	236 32 48.95	+ 1.41	-24.30	+ 21.62	+18 25 7.40
		W	...	8 28 32.0	2 33.6	50.75	48.80	.....	195 32 22.68	+ 0.74	+27.11	- 21.62	
16	6 Hydræ	W	...	8 32 57.0	2 23.1	49.65	48.35	.....	165 0 6.50	+ 0.26	+10.92	-1 11.38	-12 8 17.61
		E	...	8 38 24.0	3 3.9	51.00	49.15	.....	267 5 21.00	+ 0.74	-18.04	+1 11.38	
17	γ Pyxidis	E	...	8 44 0.0	2 19.4	51.75	49.50	.....	282 17 14.30	+ 1.17	- 8.00	+2 10.53	-27 21 23.00
		W	...	8 48 54.0	2 34.6	51.45	49.25	.....	149 47 58.38	+ 0.77	+ 9.84	-2 10.54	
18	ν Cancrī	W	...	8 54 11.0	2 47.6	49.70	48.45	.....	201 56 45.50	+ 0.15	+44.42	- 14.52	+24 49 52.80
		E	...	8 58 59.0	2 0.4	51.85	49.55	.....	230 8 10.42	+ 1.50	-22.93	+ 14.51	
19	March 25, E. 4 Puppis	W	4	7 38 48.0	2 42.1	46.25	47.60	.....	162 48 24.80	+ 4.40	+13.48	-1 18.56	-14 20 2.77
		E	...	7 44 9.0	2 38.9	40.85	44.05	.....	269 16 56.72	+ 0.92	-12.06	+1 18.56	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
18 7 49	58.2	...	...							1	216 2 41.59	...
8 5	57.0	...	...							2	40.65	+11.00
8 14	56.7	...	...							3	40.54	+10.71
8 21	...	59.0	30.198							4	40.60	+13.05
8 26	56.1	...	...							5	40.00	...
8 40	55.5	...	...							6	41.05	...
9 11	...	57.0	30.200							7	40.70	+10.84
9 19	54.1	...	...							8	40.92	+18.50
9 32	53.1	...	...							9	38.46	+24.07
9 40	52.5	...	...							10	39.00	+ 8.23
9 52	...	56.0	30.199							11	38.50	+25.49
19 6 53	...	57.0	30.098							12	39.57	...
7 15	54.8	...	...							13	37.19	+12.11
7 28	54.6	...	30.092							14	37.90	+ 1.78
7 40	54.5	...	...							15	38.30	+13.62
7 52	54.3	...	...							16	40.69	...
8 2	54.2	...	...							17	38.22	+24.02
8 13	54.2	56.0	30.093							18	39.52	+12.19
8 26	54.0	...	...							19	43.68	+22.57
8 35	54.0	...	...							
8 46	54.1	...	...							
8 57	54.0	...	...							
9 3	...	56.0	30.094									
9 41	42.3	43.6	29.870									

Notes.

3 W. One microscope reading decreased 10".
3 E. One microscope reading increased 10".

No	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>		<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	4 B. Ursæ Minoris	E	3	7 58 30.0	3 22.9	42.75	44.90		166 3 33.75	+ 1.80	+ 0.43	-1 9.98	+88 55 35.22
		W	...	8 4 53.0	3 0.1	50.50	50.20		266 1 40.50	+ 6.70	- 0.34	+1 10.00	
2	2 Cancri	W	3	8 11 14.0	2 58.0	50.00	40.85		204 38 16.45	+ 6.67	+1 0.31	- 11.87	+27 31 44.69
		E	...	8 17 5.0	2 53.0	43.05	45.05		227 26 58.78	+ 2.07	- 56.96	+ 11.87	
3	Groombridge 1418	E	...	8 23 58.0	2 21.6	43.05	45.15		160 35 1.85	+ 2.13	+ 0.94	-1 1.87	+85 23 57.45
		W	...	8 29 4.0	2 54.4	51.45	50.80		262 30 16.35	+ 7.58	- 1.43	+1 1.87	
4	4 Mali	E	4	8 36 44.0	2 59.3	42.95	45.10		287 45 50.42	+ 1.01	- 12.07	+2 56.50	-32 50 37.21
		W	...	8 42 43.0	2 59.7	51.40	50.40		144 19 25.98	+ 7.15	+ 12.12	-2 56.49	
5	220 H ¹ . Draconis S.P.	W	4	8 49 11.0	2 45.9	50.25	49.70		276 54 18.50	+ 6.67	+ 2.28	+1 45.36	+80 11 14.07
		E	...	8 55 29.0	3 32.1	43.25	45.20		155 11 1.40	+ 2.21	- 3.72	-1 45.36	
6	28 Hydræ	E	4	9 17 33.0	3 1.7	43.70	45.90		259 39 36.32	+ 2.58	- 20.23	+ 56.16	- 4 42 14.87
		W	...	9 23 33.0	2 58.3	52.35	50.75		172 25 40.58	+ 7.56	+ 19.49	- 56.13	
7	10 Leonis	W	3	9 29 5.0	3 2.2	50.40	49.90		184 23 29.60	+ 6.59	+ 26.62	- 36.35	+ 7 15 58.64
		E	...	9 35 7.0	2 59.8	43.60	45.80		247 41 49.88	+ 2.45	- 25.93	+ 36.36	
8	23 Leonis	E	3	9 42 54.0	2 54.9	43.50	45.50		241 27 3.25	+ 2.42	- 29.41	+ 28.02	+13 30 54.99
		W	...	9 48 46.0	2 57.1	51.15	50.65		190 38 11.12	+ 7.42	+ 30.16	- 28.02	
9	16 Cephei S. P.	W	4	9 54 47.0	3 3.2	50.25	49.70		284 21 45.58	+ 6.40	+ 4.56	+2 27.38	+72 43 3.52
	March 26, E.	E	...	9 59 11.0	1 20.8	43.05	45.05		147 43 30.82	+ 1.97	- 0.89	-2 27.36	
10	29 Canis Majoris	W	3	7 12 3.0	2 35.9	51.40	52.05		152 45 46.42	+ 4.19	+ 10.51	-1 53.89	-24 23 16.70
		E	...	7 17 31.0	2 52.1	45.25	48.75		279 19 32.52	+ 0.74	- 12.81	+1 53.90	
11	225 B. Draconis S.P.	E	4	7 24 22.0	3 10.2	46.25	48.55		154 24 9.35	+ 1.12	- 3.21	-1 46.43	+79 24 23.16
		W	...	7 30 56.0	3 23.8	52.70	53.10		277 41 5.60	+ 5.19	+ 3.68	+1 46.44	
12	1 Puppis	W	4	7 37 13.0	2 42.9	52.45	52.60		148 25 42.35	+ 4.80	+ 10.68	-2 19.24	-28 43 46.16
		E	...	7 42 37.0	2 41.1	45.50	48.05		283 39 34.95	+ 0.75	- 10.44	+2 19.25	
13	1 Cancri	E	3	7 48 32.0	2 58.3	46.70	49.10		238 55 21.10	+ 1.38	- 33.34	+ 24.40	+16 2 44.12
		W	...	7 54 25.0	2 54.7	52.60	52.65		193 9 55.75	+ 4.83	+ 32.01	- 24.40	
14	5 Cancri	W	3	8 1 33.0	3 5.1	49.65	50.95		202 54 35.18	+ 3.28	+ 57.60	- 13.51	+25 47 57.00
		E	...	8 7 39.0	3 0.9	46.35	49.10		229 10 42.30	+ 1.35	- 55.02	+ 13.51	
15	4 ¹ Cancri	E	3	8 14 53.0	2 57.0	47.80	49.85		236 19 44.10	+ 2.03	- 36.33	+ 21.39	+18 38 26.00
		W	...	8 20 53.0	3 3.0	53.10	53.15		195 45 26.85	+ 5.29	+ 38.83	- 21.39	
16	212 H ¹ . Draconis S.P.	W	3	8 27 28.0	2 56.3	51.15	51.70		284 52 43.55	+ 4.09	+ 4.32	+2 28.66	+72 12 4.16
		E	...	8 33 35.0	3 10.7	46.05	48.60		147 12 35.20	+ 1.03	- 5.05	-2 28.64	
17	14 Hydræ	E	3	8 41 29.0	3 1.8	47.15	49.55		258 2 43.72	+ 1.82	- 20.92	+ 52.11	- 3 5 18.04
		W	...	8 47 29.0	2 58.2	52.95	52.85		174 2 33.85	+ 5.22	+ 20.10	- 52.11	
18	2 Cancri	W	3	8 54 4.0	3 1.6	51.35	52.25		201 56 37.00	+ 4.42	+ 52.16	- 14.56	+24 49 53.68
		E	...	9 0 5.0	2 59.4	46.40	48.90		230 8 40.32	+ 1.27	- 50.89	+ 14.56	
19	98 B. Cephei S. P.	E	5	9 4 23.0	3 1.4	46.40	49.20		152 43 50.02	+ 1.27	- 3.32	-1 54.92	+77 43 50.30
		W	...	9 10 31.0	3 6.6	52.70	53.10		279 21 23.25	+ 5.15	+ 3.52	+1 54.93	
20	B.A.C. 7504 S.P.	W	4	9 16 13.0	2 35.5	52.40	52.80		270 27 50.75	+ 4.86	+ 0.74	+1 20.91	+86 38 7.78
		E	...	9 21 44.0	2 55.5	46.10	49.00		161 37 27.15	+ 1.13	- 0.94	-1 20.91	

Time	Ther- 1892	At- ther	Barom	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>mm</i>								<i>° ' "</i>	<i>"</i>
21 5 2	42.0									1	210 2 44.43	
5 14	41.9									2	43.06	+10.19
5 27	41.9	43.2	29.895							3	41.71	-4.62
5 40	41.7									4	42.76	
5 52	41.4									5	43.07	
9 0		41.0	29.893							6	43.10	+10.69
9 21	41.1									7	44.61	+16.77
9 32	40.9									8	43.48	+15.11
9 46	40.9	43.8	29.898							9	44.73	+17.82
9 57	40.9									10	40.79	+04.02
10 15		41.9	29.899							11	40.86	+9.11
10 25	40.9	45.1	29.924							12	41.55	+25.05
10 35	40.7									13	40.89	
10 40	40.7									14	42.14	+10.45
10 55	40.5									15	40.18	
11 5	40.2									16	41.58	
11 18	40.1	53.7	29.928							17	41.00	
11 31	40.5									18	42.14	+11.66
11 44	40.2									19	39.95	
11 57	40.8									20	41.84	
12 7	40.1											
12 14		52.4	29.929									
12 19	40.4											

Notes.

4 W. Clock time increased 6.^m
11 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	2 Sextantis	E W	3 ...	9 30 35.0 9 36 14.0	2 50.4 2 48.6	46.40 53.20	49.05 53.05	..... .....	249 52 43.00 182 12 34.98	+ 1.35 + 5.38	- 22.04 + 21.58	+ 38.88 - 38.88	+ 5 4 57.74
2	83 B. Leonis	W E	2 ...	9 48 20.0 9 54 11.0	2 59.1 2 51.9	50.50 45.70	51.70 48.90	..... .....	186 30 44.85 245 34 32.38	+ 3.88 + 1.08	+ 27.25 - 25.10	- 32.87 + 32.88	+ 9 23 17.74
3	υ ² Hydræ	E W	3 ...	9 57 57.0 10 3 21.0	2 28.9 2 55.1	46.05 53.00	48.85 53.10	..... .....	267 32 55.72 164 32 17.12	+ 1.11 + 5.38	- 11.73 + 16.22	+ 12.93 - 12.93	- 12 35 59.32
4	March 31, E. 3 Cancrī	W E	3 ...	7 52 15.0 7 58 15.0	2 56.4 3 3.6	43.65 44.25	47.45 48.25	..... .....	194 41 26.32 237 23 53.98	+ 0.13 + 0.59	+ 34.56 - 37.45	- 22.25 + 22.26	+ 17 34 16.50
5	φ Cancrī	E W	3 ...	8 1 40.0 8 7 24.0	2 54.3 2 49.7	44.50 44.60	48.40 48.30	..... .....	229 10 35.85 202 54 43.02	+ 1.07 + 1.02	- 51.07 + 48.42	+ 13.29 - 13.29	+ 25 47 56.83
6	58 Camelop.	E W	3 ...	8 10 47.0 8 15 15.0	1 47.1 2 40.9	44.35 44.50	47.95 48.40	..... .....	196 55 21.22 235 10 2.92	+ 0.62 + 1.21	+ 7.86 - 17.74	- 19.77 + 19.77	+ 58 2 44.93
7	θ Cancrī	W E	3 ...	8 23 16.0 8 29 7.0	2 45.6 3 5.4	44.10 44.40	47.70 48.10	..... .....	195 32 20.22 230 33 7.25	+ 0.67 + 0.75	+ 31.53 - 39.50	- 21.33 + 21.34	+ 18 25 7.43
8	α Mali	E W	4 ...	8 37 0.0 8 42 44.0	2 39.4 3 4.6	45.00 45.60	48.15 48.35	..... .....	287 45 48.80 144 19 19.70	+ 0.79 + 1.20	- 9.54 + 12.79	+ 51.06 - 51.09	- 32 50 37.45
9	76 Draconis s. p.	W E	3 ...	8 47 57.0 8 52 19.0	1 33.9 2 48.1	44.45 44.20	47.90 47.45	..... .....	274 55 32.55 157 9 46.05	+ 0.57 + 0.22	+ 0.60 - 1.91	+ 34.37 - 34.38	+ 82 10 14.13
10	98 B. Cephei s. p.	E W	2 ...	9 5 15.0 9 9 41.0	2 6.1 2 19.9	44.80 45.55	48.15 48.55	..... .....	152 43 44.58 279 21 31.80	+ 0.75 + 1.23	- 1.60 + 1.97	- 53.31 + 53.31	+ 77 43 54.25
11	h Mali	W E	4 ...	9 15 14.0 9 19 36.0	1 55.7 2 26.3	44.90 44.00	48.35 47.50	..... .....	151 35 43.15 280 29 37.15	+ 0.88 + 0.22	+ 5.68 - 9.08	- 59.08 + 59.09	- 25 33 31.57
12	A Hydræ	E W	3 ...	9 26 47.0 9 32 40.0	2 53.2 2 59.8	44.25 45.25	47.60 48.10	..... .....	260 26 32.25 171 38 43.78	+ 0.62 + 1.12	- 18.10 + 19.51	+ 55.99 - 55.99	- 5 29 14.36
13	θ Antliæ	W E	3 ...	9 36 56.0 9 42 54.0	2 54.8 3 3.2	44.35 43.35	47.50 47.30	..... .....	149 49 25.22 282 15 55.78	+ 0.38 - 0.15	+ 12.58 - 13.82	- 9.08 + 9.09	- 27 19 54.09
14	83 B. Leonis	E W	3 ...	9 48 18.0 9 54 13.0	2 57.4 2 57.6	43.95 45.00	47.70 47.80	..... .....	245 34 31.95 186 30 46.52	+ 0.57 + 0.88	- 26.73 + 26.79	+ 32.43 - 32.43	+ 9 23 18.58
15	υ ² Hydræ	W E	2 ...	9 59 5.0 10 3 18.0	1 17.1 2 55.9	43.65 43.20	47.35 47.00	..... .....	164 32 32.42 267 33 0.55	+ 0.32 - 0.12	+ 3.14 - 16.37	- 11.88 + 11.90	- 12 35 59.17
16	April 1, E. φ Cancrī	E W	4 ...	8 3 39.0 8 9 56.0	0 54.6 5 22.4	46.25 43.55	49.20 48.00	..... .....	229 9 47.72 202 52 36.08	+ 3.43 + 2.21	- 5.01 + 54.98	+ 13.07 - 13.12	+ 25 47 57.28
17	29 Cancrī	W E	3 ...	8 20 24.0 8 26 6.0	2 45.5 2 56.5	41.75 44.90	47.45 49.30	..... .....	191 39 1.55 240 26 18.45	+ 1.33 + 3.30	+ 27.24 - 30.98	- 25.54 + 25.55	+ 14 31 40.94
18	δ Hydræ	E W	3 ...	8 29 48.0 8 35 41.0	2 40.2 3 12.8	45.90 44.00	49.25 48.40	..... .....	248 55 22.02 183 9 44.00	+ 3.42 + 2.36	- 19.95 + 28.89	+ 36.53 - 36.54	+ 6 2 15.15

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903 0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
26 9 33	50.2							1	216 2 42.13	+ 17.24
9 51	50.1							2	42.18	+ 16.15
10 1	49.8							3	41.91	.....
10 7	.....	51.8	29.982					4	39.07	+ 12.80
31 7 44	.....	55.5	29.614					5	39.16	+ 10.17
7 55	54.8							6	38.04	+ 0.13
8 5	53.5							7	40.46	+ 12.97
8 13	53.1							8	36.86	.....
8 20	.....	55.0	29.610					9	39.04	.....
8 26	52.9							10	39.16	.....
8 40	52.5							11	39.00	.....
8 50	52.1							12	39.59	+ 10.76
8 57	.....	53.5	29.616*					13	40.00	+ 21.65
9 7	51.7							14	39.99	+ 16.94
9 17	51.7							15	39.98	.....
9 29	51.6							16	39.68	+ 10.16
9 40	51.8							17	40.45	+ 14.20
9 51	51.3	53.0	29.610					18	40.36	.....
10 1	51.3									
10 7	.....	52.9	29.649							
1 8 1	64.0	65.1†	29.782							
8 7	64.0									
8 23	61.6									
8 33	59.8									

Notes.

4. Hazy.

4 W. One level reading decreased 10 div.

10. Hazy, clouds.

18 E. Clock time decreased 1^m.

* Barometer reading changed from 29.136 to 29.636 in.

† Thermometer reading increased 10°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	98 B. Cephei s. p.	W	3	9 4 31.0	2 49.5	42.30	47.20	...	279 21 32.85	+ 1.29	+ 2.90	+ 1 52.35	+ 77 43 54.27
		E	...	9 10 22.0	3 1.5	44.70	49.60	...	152 43 44.08	+ 3.15	- 3.32	- 1 52.35	
2	28 Hydræ	E	5	9 17 49.0	2 41.1	45.85	49.80	...	250 39 30.85	+ 3.64	- 15.91	+ 54.05	- 4 42 15.25
		W	...	9 25 1.0	4 30.9	42.75	47.10	...	172 25 10.15	+ 1.43	+ 44.99	- 54.06	
3	Hydræ	W	3	9 32 14.0	2 37.4	40.70	46.50	...	176 25 29.00	+ 0.46	+ 16.48	- 47.03	- 0 42 25.17
		E	...	9 37 34.0	2 42.6	43.25	48.00	...	255 39 51.52	+ 1.92	- 17.59	+ 47.03	
4	April 4, E. B. Ursæ Minoris	E	3	7 58 25.0	3 10.4	47.75	48.80	...	166 3 31.52	+ 1.46	+ 0.38	- 1 10.44	+ 88 55 35.58
		W	...	8 4 23.0	2 47.6	52.35	51.50	...	266 1 46.12	+ 4.14	- 0.29	+ 1 10.47	
5	58 Camelop.	W	3	8 9 44.0	2 47.2	51.10	50.80	...	235 10 3.58	+ 3.55	- 19.16	+ 20.60	+ 58 2 44.14
		E	...	8 15 22.0	2 50.8	46.75	48.55	...	196 55 13.42	+ 1.10	+ 20.00	- 20.60	
6	29 Cancri	E	3	8 20 19.0	2 48.3	48.05	49.35	...	240 26 15.35	+ 2.07	- 28.17	+ 26.96	+ 14 31 40.48
		W	...	8 26 11.0	3 3.7	52.45	51.40	...	191 38 52.05	+ 4.29	+ 33.56	- 26.97	
7	19 G. Pyxidis	W	3	8 32 10.0	2 37.0	50.85	50.60	...	154 48 37.52	+ 3.40	+ 11.16	- 1 48.04	- 22 20 19.63
		E	...	8 37 53.0	3 5.1	47.15	48.65	...	277 16 42.90	+ 1.37	- 15.34	+ 1 48.07	
8	7 Pyxidis	W	3	8 43 55.0	2 24.8	52.25	51.35	...	149 48 0.25	+ 4.18	+ 8.63	- 2 14.61	27 21 25.48
		E	...	8 49 6.0	2 46.2	47.05	48.95	...	282 17 18.22	+ 1.55	- 11.37	+ 2 14.64	
9	ω Hydræ	E	3	8 58 6.0	2 40.9	48.75	49.30	...	249 29 5.20	+ 2.10	- 19.84	+ 39.40	+ 5 28 31.32
		W	...	9 3 38.0	2 51.1	53.45	51.95	...	182 36 7.82	+ 5.01	+ 22.43	- 39.40	
10	β Cephei s. p.	W	4	9 26 0.0	1 17.2	51.05	50.55	...	286 56 29.32	+ 3.53	+ 0.91	+ 2 51.30	+ 70 7 59.36
		E	...	9 30 23.0	3 5.8	46.15	47.30	...	145 8 53.62	+ 0.38	- 5.27	- 2 51.30	
11	23 Leonis	E	3	9 42 52.0	2 50.2	47.65	48.50	...	241 26 59.52	+ 1.40	- 27.85	+ 28.44	+ 13 30 56.15
		W	...	9 48 43.0	3 0.8	53.85	51.80	...	190 38 12.12	+ 5.06	+ 31.43	- 28.44	
12	193 G. Hydræ	W	3	9 57 1.0	2 46.4	52.20	51.30	...	153 19 45.40	+ 3.99	+ 12.09	- 1 55.68	- 23 49 18.82
		E	...	10 2 45.0	2 57.0	46.95	48.05	...	278 45 34.32	+ 0.85	- 13.78	+ 1 55.69	
13	22 Sextantis	E	3	10 9 51.0	2 52.0	48.15	48.75	...	262 32 35.45	+ 1.75	- 17.33	+ 1 3.12	- 7 35 23.96
		W	...	10 15 57.0	3 13.1	53.95	52.00	...	169 32 37.85	+ 5.09	+ 21.62	- 1 3.12	
14	48 Leonis	W	3	10 26 42.0	2 57.7	52.05	51.05	...	184 34 28.08	+ 4.00	+ 25.45	- 36.74	+ 7 26 55.68
		E	...	10 32 47.0	3 7.3	47.10	48.05	...	247 30 53.65	+ 1.03	- 28.27	+ 36.74	
15	37 Sextantis	E	3	10 38 7.0	2 50.9	48.35	48.70	...	248 4 54.92	+ 1.72	- 23.19	+ 37.58	+ 6 52 48.21
		W	...	10 43 55.0	2 57.1	53.80	52.05	...	184 0 21.35	+ 5.13	+ 24.91	- 37.58	
16	April 6, E. Cancri	W	3	8 14 50.0	2 51.0	51.50	49.15	...	195 45 35.02	+ 0.83	+ 33.91	- 21.47	+ 18 38 26.44
		E	...	8 20 43.0	3 2.0	50.30	48.35	...	236 19 46.88	+ 0.02	- 38.42	+ 21.48	
17	98 B. Cephei s. p.	E	4	9 4 32.0	2 44.5	51.10	49.25	...	152 43 46.90	+ 0.70	- 2.73	- 1 55.20	+ 77 43 53.16
		W	...	9 10 28.0	3 11.5	54.30	50.80	...	279 24 28.30	+ 2.52	+ 3.70	+ 1 55.20	

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903 0
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>						<i>"</i>	<i>"</i>
1 45		62.0	29.795					1	216 2 40.48	
2 7	68.4							2	40.57	+ 19.76
9 15		66.0	29.792					3	40.90	+ 18.69
2 22	68.0							4	41.08	
2 35	57.1							5	41.24	- 0.16
2 44		68.0	29.788					6	39.87	+ 14.15
4 1	68.8	38.1	29.742					7	40.55	+ 21.86
8 12	15.7							8	40.75	+ 15.76
8 13	15.2							9	41.16	+ 17.22
8 15	15.0	17.0	29.781					10	41.24	
8 47	14.7							11	40.84	+ 14.84
8 57		16.2	29.795					12	41.44	+ 22.91
9 1	14.0							13	42.22	
9 25	12.2							14	42.02	+ 16.61
9 46		14.8	29.824					15	42.43	
9 46	10.9							16	39.68	
10 0	12.7							17	39.70	
10 2		11.8	29.830							
10 14	12.1									
10 30	11.9									
10 41	11.7									
10 45		11.5	29.826							
10 48		11.1	29.846							
10 7										
10 18	40.2									
10 28		10.9	29.851							
10 38	48.8									

Notes:
 1. One level reading increased 0.14
 2. Cloud.
 3. Barometer reading changed from 29.824 to 29.810

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	28 Hydræ	W E	3	9 17 51.0 9 22 49.0	2 34.7 2 23.3	53.65 50.55	50.15 48.30	..... .....	172 25 45.62 259 39 28.98	+ 1.92 + 0.16	+ 14.67 - 12.59	- 55.41 + 55.41	- 4 42 15.76
2	κ Hydræ	E W	3	9 32 47.0 9 38 33.0	2 45.1 3 0.9	50.70 53.70	48.50 50.45	..... .....	268 50 46.70 163 14 27.18	+ 0.49 + 2.44	- 14.09 + 16.92	+ 16.54 - 16.54	- 13 53 53.00
3	ν Leonis	W E	2	9 50 3.0 9 56 0.0	2 50.1 3 6.9	51.75 50.05	49.35 48.50	..... .....	190 1 36.58 242 3 48.82	+ 1.00 + 0.01	+ 27.28 - 32.93	- 28.39 + 28.39	+ 12 54 12.91
4	22 Sextantis	E W	4	10 9 58.0 10 15 40.0	2 43.5 2 58.5	50.80 53.65	48.50 50.35	..... .....	262 32 33.45 169 32 40.00	+ 0.57 + 2.32	- 15.50 + 18.47	+ 1.26 - 1.26	- 7 35 23.30
5	April 10, E. ε Cancri	W E	3	9 0 49.0 9 6 30.0	2 48.0 2 53.0	50.75 47.55	48.55 46.65	..... .....	199 33 3.58 232 32 16.68	+ 3.62 + 1.78	+ 38.99 - 41.34	- 16.95 + 16.95	+ 22 26 4.41
6	B. A. C. 7504 S. P.	E W	3	9 15 52.0 9 21 48.0	4 49.6 1 6.4	48.50 52.65	47.30 49.45	..... .....	161 37 23.82 270 27 55.00	+ 2.30 + 4.58	- 2.56 + 0.13	- 19.73 + 19.73	+ 86 38 5.37
7	A Hydræ	W E	2	9 26 57.0 9 32 1.0	2 35.4 2 28.6	52.30 47.65	49.30 46.45	..... .....	171 38 47.92 260 26 29.12	+ 4.48 + 1.69	+ 14.57 - 13.33	- 56.00 + 56.01	- 5 29 14.43
8	14 Leonis Minoris	E W	2	9 38 27.0 9 43 0.0	1 53.5 2 39.5	48.70 52.25	47.20 49.50	..... .....	209 23 40.18 222 42 10.52	+ 2.29 + 4.61	+ 33.04 - 5.22	- 6.68 + 6.69	+ 45 33 50.71
9	υ ² Hydræ	W E	3	9 58 46.0 10 3 5.0	1 28.3 2 50.7	48.65 46.10	46.65 45.50	..... .....	164 32 32.92 267 33 1.45	+ 2.10 + 0.80	+ 4.12 - 15.42	- 12.01 + 12.03	- 12 35 59.03
10	138 B. Ursæ Majoris	E W	3	10 11 5.0 10 17 5.0	3 0.4 2 59.6	48.00 51.70	46.20 47.95	..... .....	200 15 34.50 231 49 43.38	+ 1.60 + 3.57	+ 29.34 - 29.08	- 16.22 + 16.23	+ 54 42 9.27
11	44 Hydræ	W E	3	10 26 23.0 10 32 13.0	2 51.5 2 58.5	50.45 47.10	47.85 45.95	..... .....	153 53 52.42 278 11 28.25	+ 3.13 + 1.21	+ 12.97 - 14.05	- 148.01 + 148.02	- 23 15 4.63
12	37 Sextantis	E W	2	10 37 46.0 10 43 48.0	3 7.0 2 55.0	48.10 52.20	46.35 48.60	..... .....	248 5 1.58 184 0 22.18	+ 1.74 + 4.14	- 27.76 + 24.32	+ 35.88 - 35.88	+ 6 52 48.51
13	36 H. Cephei s. p.	W E	3	10 51 50.0 10 58 22.0	3 3.2 3 28.8	51.70 47.70	48.50 46.15	..... .....	273 16 16.78 158 49 4.38	+ 3.94 + 1.52	+ 1.82 - 2.37	+ 128.97 - 128.99	+ 83 49 34.69
14	n Leonis	E W	3	11 7 31.0 11 13 34.0	3 4.9 2 58.1	49.35 52.75	46.70 48.80	..... .....	241 8 3.62 190 57 15.78	+ 2.38 + 4.35	- 33.22 + 30.82	+ 27.03 - 27.04	+ 13 49 58.88
15	April 17, H. ε Leonis	E W	3	9 23 44.0 9 29 34.0	3 0.3 2 49.7	52.45 52.65	49.45 49.10	..... .....	243 14 24.20 188 50 54.55	+ 2.86 + 2.65	- 29.55 + 26.18	+ 29.23 - 29.23	+ 11 43 30.54
16	83 B. Leonis	W E	3	9 48 19.0 9 54 15.0	2 59.8 2 56.2	49.00 50.10	47.10 47.75	..... .....	186 30 47.08 245 34 31.45	+ 0.64 + 1.30	+ 27.46 - 26.37	- 32.29 + 32.29	+ 9 23 18.95
17	48 Leonis	W E	3	10 26 41.0 10 32 39.0	3 5.0 2 53.0	49.35 49.45	46.95 47.60	..... .....	184 34 30.18 247 30 50.90	+ 0.68 + 1.01	+ 27.59 - 24.12	- 34.97 + 34.97	+ 7 26 57.20
18	54 Leonis	E W	3	10 47 22.0 10 53 15.0	3 1.3 2 51.7	52.55 51.25	48.95 48.00	..... .....	229 42 41.38 202 22 38.55	+ 2.62 + 1.76	- 53.38 + 47.90	+ 13.89 - 13.89	+ 25 15 51.74

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
6 9 20	48.4									1	216 2 39.38	+ 19.93
9 30	.....	50.6	29.953							2	39.82	.....
9 36	48.4									3	40.38	+ 14.88
9 53	48.6									4	39.66	.....
10 11	48.4									5	41.60	+ 11.45
10 19	.....	50.7	29.954							6	41.64	.....
10 8 54	.....	58.7	29.932							7	42.23	+ 19.96
9 4	50.1									8	42.72	+ 4.71
9 19	50.9									9	43.00	.....
9 29	50.2									10	41.66	+ 3.01
9 41	50.1	58.4	29.943							11	41.97	+ 22.08
10 1	55.2									12	43.10	.....
10 14	55.1									13	43.02	+ 3.24
10 29	55.7									14	41.86	+ 13.63
10 41	55.2									15	40.44	.....
10 48	.....	57.0*	29.936							16	40.78	+ 15.32
10 55	54.6									17	43.12	+ 15.32
11 11	51.9	55.0	29.936							18	39.42	+ 10.31
17 9 15	.....	56.0	29.976									
9 27	51.1											
9 51	52.3											
10 18	.....	53.5	29.990									
10 30	51.3											
10 50	51.9											
10 58	.....	53.5	29.626									

Notes.
 4. Clouds.
 c W. One microscope reading decreased 10".
 9. Hazy; clouds.
 * Thermometer reading increased 30°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϕ Leonis	W	...	11 8 45.0	3 0.0	48.60	46.45	...	174 0 23.65	+ 0.22	+20.63	- 51.48	- 3 7 32.86
		E	...	11 14 28.0	2 42.4	49.05	47.15	...	258 4 56.95	+ 0.67	-16.68	+ 51.48	
2	ϵ Leonis	E	...	11 22 25.0	2 58.3	50.35	48.00	...	257 25 46.25	+ 1.42	-20.38	+ 50.46	- 2 28 21.02
		W	...	11 28 3.0	2 39.7	50.50	48.05	...	174 39 34.62	+ 1.51	+16.35	- 50.46	
3	ζ Crateris	W	...	11 36 50.0	3 2.7	49.40	47.10	...	150 19 35.92	+ 0.71	+16.12	-1 27.17	-17 48 58.78
		E	...	11 42 40.0	2 47.3	49.50	47.25	...	272 45 42.35	+ 0.81	-13.52	+1 27.18	
4	ι Virginis	E	...	11 51 40.0	3 11.6	51.25	48.55	...	250 46 12.62	+ 2.06	-27.27	+ 39.76	+ 4 11 29.76
		W	...	11 57 33.0	2 32.4	51.05	48.55	...	181 19 13.30	+ 2.21	+17.25	- 39.75	
5	April 18, E. 60 Cancri	W	2	8 47 41.0	2 57.2	45.90	50.10	...	189 0 57.10	+ 0.70	+28.78	- 28.45	-11 59 33.52
		E	...	8 53 20.0	2 50.9	51.40	54.10	...	242 58 18.68	+ 4.40	-26.77	+ 28.45	
6	B. A. C. 7504 S. P.	E	3	9 16 28.0	2 26.0	51.70	53.80	...	161 37 17.82	+ 4.21	+ 0.66	-1 18.41	+86 38 4.28
		W	...	9 21 33.0	2 38.2	48.80	51.95	...	270 27 59.20	+ 2.34	+ 0.77	+1 18.41	
7	100 G. Hydræ	W	3	9 26 8.0	2 36.9	48.00	51.35	...	156 27 12.60	+ 1.91	+11.33	-1 35.49	-20 41 35.06
		E	...	9 31 22.0	2 37.1	51.00	54.10	...	275 38 5.52	+ 4.49	-11.36	+1 35.50	
8	ϕ Leonis	E	2	9 35 44.0	2 43.4	52.70	54.65	...	240 30 13.15	+ 5.07	-26.49	+ 25.60	+14 27 41.74
		W	...	9 41 27.0	2 59.6	48.40	51.50	...	191 34 58.60	+ 2.13	+32.01	- 25.60	
9	158 B. Cephei S. P.	W	4	9 48 42.0	2 55.7	47.40	50.55	...	283 50 33.05	+ 1.43	+ 4.07	+2 17.15	+73 14 30.10
		E	...	9 54 39.0	3 1.4	51.50	53.45	...	148 14 47.00	+ 4.06	+ 4.35	-2 17.14	
10	29 H. Camelop.	E	2	10 13 0.0	2 41.7	52.80	54.05	...	170 14 2.52	+ 4.84	+ 1.42	- 57.98	+84 44 47.29
		W	...	10 18 21.0	2 39.3	48.85	51.70	...	261 51 12.75	+ 2.34	- 1.37	- 57.98	
11	44 Hydræ	W	4	10 26 33.0	2 51.6	47.55	51.10	...	153 53 53.32	+ 1.56	+12.98	-1 46.44	-23 15 4.30
		E	...	10 32 25.0	3 0.4	51.85	53.85	...	278 11 27.32	+ 4.27	-14.35	+1 46.46	
12	α Crateris	W	3	10 52 10.0	2 53.4	47.50	50.95	...	159 21 19.08	+ 1.55	+14.54	-1 25.87	-17 47 16.44
		E	...	10 58 10.0	3 6.6	47.15	53.85	...	272 44 2.25	+ 4.55	-16.83	+1 25.88	
13	η Leonis	E	3	11 7 51.0	2 56.9	53.50	54.15	...	241 7 58.40	+ 4.87	-30.41	+ 26.55	+13 49 59.26
		W	...	11 13 41.0	2 53.1	49.00	51.55	...	190 57 19.38	+ 2.31	+20.11	- 26.54	
14	83 Leonis	W	2	11 18 59.0	2 52.2	47.00	50.75	...	180 39 57.82	+ 1.22	+21.69	- 40.26	+ 3 32 14.39
		E	...	11 24 34.0	2 42.9	51.25	53.60	...	251 25 20.52	+ 3.09	-19.41	+ 40.26	
15	April 18, H. 32 Libræ	E	...	15 19 42.0	3 5.5	47.95	46.95	...	271 19 37.68	+ 2.57	-17.04	+1 22.13	-16 22 46.46
		W	...	15 25 32.0	2 44.5	46.10	46.15	...	160 45 45.85	+ 1.63	+13.40	-1 22.13	
16	κ Libræ	W	...	15 33 24.0	2 57.8	44.50	44.45	...	157 46 48.38	+ 0.16	+14.88	-1 32.01	-19 21 52.06
		E	...	15 39 17.0	2 55.2	45.70	45.75	...	274 18 30.55	+ 1.10	-14.45	+1 32.00	
17	49 Libræ	E	...	15 51 57.0	2 56.3	46.75	46.45	...	271 11 42.85	+ 1.96	-15.42	+1 21.75	-16 14 52.88
		W	...	15 57 40.0	2 46.7	45.60	45.65	...	160 53 38.45	+ 1.21	+13.79	-1 21.75	
18	ν Scorpil	W	...	16 3 20.0	3 1.8	44.75	45.05	...	157 56 6.60	+ 0.42	+15.00	-1 31.45	-19 12 31.38
		E	...	16 9 10.0	2 48.2	46.15	46.10	...	274 9 7.98	+ 1.53	-13.35	+1 31.45	

Time	Ther- (°F)	Att. ther	Barom	Observation made at V with fixed thread, except as noted below	No.	Zenith point	Red. to 1901.0
d h m	°	°	in			° ' "	"
17 11 12	51.8				1	216 2 42.29	+16.99
11 24	50.4	52.5	29.608		2	19 38	+16.18
11 40	49.4				3	41 20	
11 57	49.7				4	40 09	+11.11
12 1		51.5	29.616		5	41 45	+14.60
12 47	51.2		29.576		6	41 34	
1 11	50.4				7	42 25	+21.71
2 15		52.2	29.581		8	43 24	+13.51
3 10	52.2				9	42 54	
3 22	52.2				10	41 25	
3 39	52.2				11	48 56	+22.84
3 52	52.2	50.5	29.592		12	42 58	
4 55	52.8				13	41 34	+11.64
5 55	52.1				14	43 92	
6 28	52.5	52.0	29.586		15	42 05	
6 55	52.5				16	40 30	
7 5	52.5	52.1	29.586		17	41 47	
7 17	52.5				18	39 49	
7 32	52.5						
7 48	52.5			13 F One microscope reading decreased 10 ^μ			
7 53	52.5			15 W One microscope reading increased 10 ^μ			
7 55	52.5			* Barometer reading changed from 29.586 to 29.586 in			
7 56	52.5						
7 57	52.5						
7 58	52.5						
7 59	52.5						
8 0	52.5						
8 1	52.5						
8 2	52.5						
8 3	52.5						
8 4	52.5						
8 5	52.5						
8 6	52.5						
8 7	52.5						
8 8	52.5						
8 9	52.5						
8 10	52.5						
8 11	52.5						
8 12	52.5						
8 13	52.5						
8 14	52.5						
8 15	52.5						
8 16	52.5						
8 17	52.5						
8 18	52.5						
8 19	52.5						
8 20	52.5						
8 21	52.5						
8 22	52.5						
8 23	52.5						
8 24	52.5						
8 25	52.5						
8 26	52.5						
8 27	52.5						
8 28	52.5						
8 29	52.5						
8 30	52.5						
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8 38	52.5						
8 39	52.5						
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8 42	52.5						
8 43	52.5						
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8 54	52.5						
8 55	52.5						
8 56	52.5						
8 57	52.5						
8 58	52.5						
8 59	52.5						
9 0	52.5						
9 1	52.5						
9 2	52.5						
9 3	52.5						
9 4	52.5						
9 5	52.5						
9 6	52.5						
9 7	52.5						
9 8	52.5						
9 9	52.5						
10 0	52.5						
10 1	52.5						
10 2	52.5						
10 3	52.5						
10 4	52.5						
10 5	52.5						
10 6	52.5						
10 7	52.5						
10 8	52.5						
10 9	52.5						
11 0	52.5						
11 1	52.5						
11 2	52.5						
11 3	52.5						
11 4	52.5						
11 5	52.5						
11 6	52.5						
11 7	52.5						
11 8	52.5						
11 9	52.5						
12 0	52.5						
12 1	52.5						
12 2	52.5						
12 3	52.5						
12 4	52.5						
12 5	52.5						
12 6	52.5						
12 7	52.5						
12 8	52.5						
12 9	52.5						
13 0	52.5						
13 1	52.5						
13 2	52.5						
13 3	52.5						
13 4	52.5						
13 5	52.5						
13 6	52.5						
13 7	52.5						
13 8	52.5						
13 9	52.5						
14 0	52.5						

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	<i>p</i> Ophiuchi (<i>s. star.</i>)	E	...	16 16 40.0	3 6.5	46.80	47.00	...	278 9 46.68	+ 2.25	- 15.34	+1 47.82	-23 13 23.76
		W	...	16 22 29.0	2 42.4	45.60	45.75	...	153 55 35.15	+ 1.26	+ 11.63	-1 47.82	
2	24 Scorpii	W	...	16 32 36.0	3 22.1	44.55	45.00	...	159 35 15.35	+ 0.52	+ 19.82	-1 26.24	-17 33 14.78
		E	...	16 38 43.0	2 44.9	45.75	46.35	...	272 29 58.00	+ 1.66	- 13.20	+1 26.24	
3	<i>h</i> Herculis	E	...	16 43 40.0	1 56.8	46.45	46.45	...	247 32 38.15	+ 1.70	- 10.99	+ 35.18	+ 7 24 52.90
		W	...	16 48 43.0	3 6.2	45.75	45.75	...	184 32 22.32	+ 1.10	+ 27.93	- 35.18	
4	April 21, E. 11 Cephei S. P.	W	3	9 39 29.0	1 1.0	46.05	46.65	...	286 13 3.70	+ 1.19	+ 0.55	+2 35.73	+70 51 44.96
		E	...	9 45 30.0	5 0.0	43.95	45.75	...	145 52 33.65	+ 0.24	- 13.31	-2 35.80	
5	24 Cephei S. P.	E	3	10 7 30.0	0 26.2	45.50	46.75	...	146 52 5.18	+ 1.32	- 0.10	-2 27.90	+71 51 42.11
		W	...	10 13 1.0	5 4.9	46.15	47.50	...	285 12 58.18	+ 1.40	+ 13.15	+2 27.87	
6	37 Leonis Minoris	W	3	10 32 27.0	0 49.9	44.15	45.55	...	209 36 1.55	+ 0.08	+ 7.75	- 6.43	+32 28 39.88
		E	...	10 38 17.0	5 0.1	44.55	46.20	...	222 33 55.45	+ 0.55	-4 45.55	+ 6.43	
7	54 Leonis	E	3	10 49 32.0	0 50.9	45.90	46.90	...	229 41 53.72	+ 1.31	- 4.21	+ 13.81	+25 15 51.47
		W	...	10 55 22.0	4 59.2	46.35	46.80	...	202 21 1.10	+ 1.36	+2 25.24	- 13.81	
8	<i>χ</i> Hydræ	W	2	11 0 38.0	0 2.9	45.00	46.10	...	150 22 54.85	+ 0.64	- 0.00	-2 5.01	-26 46 32.58
		E	...	11 6 51.0	6 10.1	45.00	46.35	...	281 43 20.55	+ 0.64	- 56.91	+2 5.04	
9	83 Leonis	E	2	11 21 1.0	0 50.9	46.30	47.05	...	251 25 1.70	+ 1.71	- 1.89	+ 40.37	+ 3 32 15.04
		W	...	11 26 54.0	5 2.1	46.70	47.10	...	180 39 10.08	+ 1.84	+1 6.74	- 40.36	
10	April 27, E. 158 B. Cephei S. P.	E	2	9 49 12.0	2 36.4	46.80	48.00	...	148 14 45.42	+ 3.09	- 3.23	-2 18.43	+73 14 28.75
		W	...	9 55 42.0	3 53.6	46.05	46.95	...	283 50 27.62	+ 2.39	+ 7.21	+2 18.44	
11	42 Leonis	W	2	10 13 48.0	2 59.9	42.45	45.35	...	192 34 56.10	+ 0.44	+ 33.24	- 24.73	+15 27 40.65
		E	...	10 19 41.0	2 53.1	44.60	47.00	...	239 30 21.50	+ 1.99	- 30.78	+ 24.73	
12	226 B. Cephei S. P.	E	3	10 29 20.0	1 23.1	45.75	47.00	...	150 43 28.28	+ 2.18	- 0.80	-2 3.27	+75 43 29.08
		W	...	10 33 49.0	3 5.9	45.00	46.75	...	281 21 45.50	+ 1.78	+ 3.98	+2 3.27	
13	<i>d</i> Leonis	W	2	10 52 35.0	3 8.8	43.45	45.90	...	181 15 39.45	+ 0.91	+ 26.44	- 39.57	+ 4 8 3.73
		E	...	10 58 41.0	2 57.1	45.00	46.90	...	250 49 35.28	+ 1.89	- 23.27	+ 39.57	
14	<i>φ</i> Leonis	E	2	11 9 12.0	2 42.8	46.05	47.20	...	258 4 53.28	+ 2.45	- 16.76	+ 51.40	- 3 7 32.64
		W	...	11 14 55.0	3 0.2	45.65	46.75	...	174 0 20.05	+ 2.20	+ 20.54	- 51.40	
15	<i>e</i> Leonis	W	2	11 22 28.0	3 4.5	43.85	46.20	...	174 39 29.70	+ 1.20	+ 21.82	- 50.24	- 2 28 21.63
		E	...	11 28 22.0	2 49.5	45.35	46.90	...	257 25 45.65	+ 1.96	- 18.42	+ 50.24	
16	<i>o</i> Hydræ	E	4	11 32 51.0	2 44.2	45.90	47.55	...	289 7 42.92	+ 2.45	- 9.89	+3 5.66	-34 12 45.26
		W	...	11 38 23.0	2 47.8	45.45	46.55	...	142 57 30.40	+ 1.86	+ 10.33	-3 5.67	
17	<i>o</i> Leonis	W	3	11 47 47.0	3 5.2	43.35	45.55	...	193 18 10.45	+ 0.93	+ 36.16	- 23.93	+16 11 0.23
		E	...	11 53 50.0	2 57.8	45.05	46.60	...	238 47 4.42	+ 1.82	- 33.33	+ 23.93	
18	10 Virginis	E	2	12 2 27.0	2 27.3	46.00	47.45	...	252 31 7.58	+ 2.52	- 15.47	+ 42.21	+ 2 26 20.17
		W	...	12 7 30.0	2 35.7	45.25	46.50	...	179 34 6.42	+ 1.98	+ 17.29	- 42.21	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
18 16 20	50.4	...	...					1	216 2 40.82	- 2.41
16 27	...	52.5	29.596					2	41.08	- 2.50
16 35	50.0	...	...					3	40.10	+ 2.91
16 46	49.2	...	...					4	42.98	...
16 56	...	51.5	29.596					5	39.58	...
21 9 40	54.5	...	29.530					6	39.92	+ 7.71
10 8	54.4	...	...					7	39.26	+ 9.82
10 27	...	55.7	29.543					8	39.90	+ 22.24
10 13	54.2	...	...					9	40.10	...
10 50	53.7	...	...					10	41.26	...
11 2	53.3	...	...					11	41.24	+ 12.38
11 11	...	55.1	29.550					12	40.46	...
11 22	53.0	...	...					13	40.35	...
27 9 46	...	62.8	30.007					14	40.88	+ 16.71
9 52	60.4	...	...					15	40.96	+ 16.68
10 8	...	61.9	30.005					16	39.03	+ 21.53
10 17	59.6	...	...					17	40.23	+ 10.55
10 14	59.9	...	...					18	40.10	+ 13.53
10 56	59.6	...	...					
11 4	...	61.0	30.011							
11 12	59.2	...	...					
11 25	59.0	...	...					
11 36	58.2	...	...					
11 51	58.9	...	...					
11 59	...	60.0	30.019							
12 4	58.6	...	...					

Notes.
 1. Assumed that the south star was observed.
 2 E. Clock time increased 1^m.
 4-9. Clock time increased 2^m.
 4. Hazy; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	6 B. Ursæ Minoris	W	2	12 11 35.0	3 13.2	44.10	46.15		265 20 37.32	+ 1.38	- 0.64	+1 6.37	+88 14 19.59
	April 27, H.	E		12 17 33.0	2 44.8	45.05	47.05		166 44 42.58	+ 2.28	+ 0.47	-1 6.37	
2	83 Virginis	W		13 36 10.0	3 17.5	48.25	46.50		161 26 43.70	+ 0.79	+19.54	-1 20.65	-15 41 38.73
		E		13 41 57.0	2 29.5	48.55	46.85		270 38 24.00	+ 1.10	-11.20	+1 20.63	
3	92 Virginis	E		13 48 27.0	3 15.9	49.40	47.60		253 26 18.25	+ 1.73	-26.80	+ 43.92	+ 1 31 20.25
		W		13 54 22.0	2 39.1	50.15	47.25		178 39 8.48	+ 1.67	+17.68	- 43.92	
4	94 Virginis	W		13 59 45.0	1 36.2	47.75	46.30		168 42 26.10	+ 0.58	+ 5.28	-1 2.43	- 8 25 50.75
		E		14 4 55.0	3 33.8	49.05	47.60		263 23 6.88	+ 1.51	-26.09	+ 1 2.43	
5	2 Libræ	E		14 15 6.0	3 18.1	50.50	48.15		266 13 31.62	+ 2.15	-21.26	+1 9.02	-11 16 24.35
		W		14 21 9.0	2 44.9	49.60	47.05		165 51 51.95	+ 1.45	+14.74	-1 9.01	
6	142 H ¹ . Cephei s. p.	W		14 30 49.0	3 11.3	47.95	46.35		276 3 23.40	+ 0.52	+ 2.79	+1 39.65	+81 2 16.79
		E		14 36 53.0	2 52.7	48.45	46.70		156 1 54.80	+ 0.76	- 2.27	-1 39.66	
7	5 ¹ Libræ	E		14 45 56.0	3 22.7	49.20	47.60		266 27 20.88	+ 1.51	-22.17	+1 9.66	-11 30 14.65
		W		14 51 59.0	2 40.3	49.20	47.25		165 38 1.12	+ 1.56	+13.86	-1 9.66	
8	c Boötis	W		15 0 13.0	3 0.9	47.20	45.80		202 21 27.92	+ 0.01	+53.09	- 14.04	+25 14 42.85
		E		15 5 56.0	2 42.1	48.55	47.00		229 43 42.60	+ 0.97	-42.64	+ 14.04	
9	0 ² Libræ	E		15 14 34.0	3 15.0	49.55	47.55		269 44 17.45	+ 1.75	-19.36	+1 18.18	-14 47 20.45
		W		15 20 37.0	2 48.0	49.15	47.25		162 21 5.88	+ 1.37	+14.36	-1 18.18	
10	3 H. Scorpil	W		15 27 50.0	3 30.3	48.00	46.35		149 20 26.70	+ 0.68	+18.07	-2 12.84	-27 48 51.98
	April 28, E.	E		15 33 48.0	2 27.7	48.10	46.50		282 44 45.60	+ 0.74	- 8.91	+2 12.83	
11	Leonis	E	3	9 50 19.0	2 53.1	50.80	47.40		242 3 39.88	+ 3.56	-28.27	+ 27.34	+12 54 14.58
		W		9 55 54.0	2 41.9	47.85	44.55		190 1 39.30	+ 1.29	+24.73	- 27.35	
12	24 Cephei s. p.	W	4	10 5 4.0	3 3.4	46.60	44.40		285 13 9.78	+ 0.93	+4.76	+2 26.49	+71 51 41.21
		E		10 11 9.0	3 1.6	48.35	45.10		146 52 7.20	+ 2.04	- 4.67	-2 26.49	
13	32 H. Cephei s. p.	E	2	10 18 13.0	3 0.6	48.50	45.10		160 36 23.62	+ 2.02	- 1.29	-1 21.66	+85 37 6.39
		W		10 24 54.0	3 40.4	46.95	44.40		271 28 51.52	+ 1.11	+ 1.91	+1 21.66	
14	39 Ursæ Majoris	W	2	10 34 47.0	3 0.9	45.35	43.65		234 49 56.52	+ 0.02	-23.03	+ 19.11	+57 42 30.43
		E		10 41 40.0	3 52.1	47.75	45.45		197 15 4.85	+ 1.81	+37.91	- 19.12	
15	54 Leonis	E	2	10 47 56.0	2 37.7	48.40	45.65		229 42 28.78	+ 2.24	-40.40	+ 13.68	+25 15 52.32
		W		10 53 9.0	2 35.3	47.25	44.35		202 22 48.55	+ 1.19	+30.18	- 13.68	
16	7 Hydræ	W	3	10 58 6.0	2 45.8	46.15	44.05		150 22 41.52	+ 0.72	+11.43	-2 3.67	-26 46 33.83
		E		11 3 41.0	2 49.2	47.60	45.40		281 42 37.75	+ 1.83	-11.90	+2 3.68	
17	n Leonis	E	2	11 7 59.0	3 0.6	48.40	45.70		241 7 58.88	+ 1.93	-31.70	+ 26.34	+13 50 0.81
		W		11 14 0.0	3 0.4	47.35	44.70		190 57 16.80	+ 1.28	+31.62	- 26.34	
18	83 Leonis	W	2	11 18 54.0	3 8.9	46.15	44.20		180 39 51.20	+ 0.54	+20.10	- 39.99	+ 3 32 14.68
		E		11 25 0.0	2 57.1	48.00	45.50		251 25 23.30	+ 1.84	-22.95	+ 39.99	

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No	Zenith point	Red. to 1903 a
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>m</i>								<i>s</i>	<i>"</i>
25 12 15	68.4									1	215 2 41.20	
12 42		59.8	10 50.0							2	48 06	+10 82
13 02	55.9									3	40.51	+ 9.01
13 14	60.4	56.5	40 00							4	37.14	
14 12	54.6									5	40.01	+ 8.01
14 18	54.4									6	40.00	+ 0.00
14 26		56.5	40 00							7	45.38	+ 1.38
14 34	51.8									8	40.08	+ 0.08
14 48	51.9									9	40.72	
14 56		55.3	40 00							10	41.44	+ 1.44
15 1	54.1									11	46.54	+ 1.54
15 08	52.1									12	40.02	
15 11	57.2									13	59.45	+ 7.45
15 15		56.9	40 00							14	50.04	+ 0.04
15 22										15	52.72	+ 2.72
15 29	68.4	59.4	40 00							16	40.68	+ 0.68
16 11	68.3									17	42.48	+ 2.48
16 18	65.0									18	40.82	
16 22		68.1	40 00									
16 26	68.2											
16 31	66.5											
16 41	66.6											
16 44	66.4	68.1	40 00									
16 49	66.7											

Note

10 E. One level reading decreased in div.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	<i>r</i> Cephei S. P.	E	3-4	11 32 34.0	2 57.5	47.85	47.20	.....	152 5 15.10	+ 1.73	- 3.32	-1 55.00	+77 5 20.63
		W	...	11 38 34.0	3 2.5	45.30	44.55	.....	280 0 3.62	+ 1.43	+ 3.51	+1 55.00	
2	Groombridge 4163 S. P.	W	4	11 47 7.0	3 9.1	46.10	43.80	.....	283 12 57.28	+ 0.54	+ 4.57	+2 13.25	+73 52 8.41
		E	...	11 53 24.0	3 7.9	47.30	44.65	.....	148 52 22.48	+ 1.44	- 4.52	-2 13.25	
3	128 H ¹ . Camelop.	E	3	11 57 33.0	2 36.5	47.10	44.65	.....	168 51 20.45	+ 1.17	+ 0.96	-1 0.87	+86 7 33.78
		W	...	12 3 38.0	3 28.5	47.00	44.45	.....	263 13 55.48	+ 0.92	- 1.70	+1 0.87	
4	<i>c</i> Virginis	W	2	12 12 28.0	3 9.8	46.45	43.95	.....	180 58 32.18	+ 0.81	+26.54	- 39.58	+ 3 50 56.59
	April 29, E.	E	...	12 18 35.0	2 57.2	47.95	45.20	.....	251 6 42.20	+ 1.83	-23.14	+ 39.58	
5	23 Leonis	E	2	9 42 54.0	3 6.7	51.05	50.35	.....	241 27 1.38	+ 5.33	-33.51	+ 26.07	+13 30 58.15
		W	...	9 49 1.0	3 0.3	45.80	47.25	.....	190 38 14.25	+ 2.45	+31.25	- 26.07	
6	16 Cephei S. P.	W	3	9 54 59.0	3 5.8	44.80	46.60	.....	284 22 4.22	+ 1.88	+ 4.69	+2 17.31	+72 42 56.25
		E	...	10 1 1.0	2 56.2	49.90	49.90	.....	147 43 11.12	+ 4.71	- 4.22	-2 17.31	
7	24 Cephei S. P.	E	3	10 5 36.0	2 33.4	50.00	50.00	.....	146 51 59.18	+ 4.54	- 3.33	-2 23.48	+71 51 39.30
		W	...	10 10 11.0	2 1.6	45.05	46.75	.....	285 13 17.35	+ 1.67	+ 2.09	+2 23.50	
8	42 Leonis	W	3	10 14 40.0	2 11.3	44.50	46.55	.....	192 35 10.22	+ 1.44	+17.71	- 23.90	+15 27 41.58
		E	...	10 18 44.0	1 52.7	49.45	49.65	.....	239 30 0.35	+ 4.81	-13.05	+ 23.90	
9	34 Sextantis	E	2	10 34 45.0	3 6.0	50.80	50.45	.....	250 52 32.32	+ 5.45	-25.63	+ 38.32	+ 4 5 8.41
		W	...	10 41 11.0	3 20.0	44.80	46.35	.....	181 12 40.68	+ 1.58	+29.63	- 38.32	
10	α Crateris	W	2	10 52 49.0	2 28.1	43.00	45.45	.....	159 21 20.75	+ 0.40	+10.60	-1 23.80	-17 47 16.93
		E	...	10 57 33.0	2 15.8	48.55	49.45	.....	272 43 56.75	+ 3.86	- 8.92	+1 23.81	
11	π Cephei S. P.	E	2	11 2 3.0	2 58.0	49.20	49.50	.....	149 51 42.15	+ 4.15	- 3.84	-2 4.39	+74 51 39.61
		W	...	11 7 57.0	2 56.0	44.45	46.55	.....	282 13 35.70	+ 1.30	+ 3.75	+2 4.40	
12	39 H. Cephei S. P.	W	2	11 24 54.0	3 0.9	44.25	46.45	.....	270 19 49.70	+ 1.11	+ 0.96	+1 16.74	+86 46 15.73
		E	...	11 31 1.0	3 6.1	48.40	49.15	.....	161 45 27.60	+ 3.80	- 1.02	-1 16.72	
13	ν Virginis	E	2	11 38 10.0	2 56.8	49.55	49.85	.....	247 53 33.92	+ 4.47	-24.94	+ 34.27	+ 7 4 9.37
		W	...	11 43 57.0	2 50.2	45.55	46.80	.....	184 11 42.20	+ 1.73	+23.11	- 34.27	
14	σ Leonis	W	2	11 47 55.0	3 0.6	44.25	46.10	.....	193 18 11.20	+ 1.43	+34.39	- 23.14	+16 11 0.28
		E	...	11 53 56.0	3 0.4	48.90	49.50	.....	238 47 3.95	+ 4.24	-34.31	+ 23.14	
15	128 H ¹ . Camelop.	E	2	11 58 0.0	2 11.4	50.00	50.05	.....	168 51 18.75	+ 4.78	+ 0.67	- 59.53	+86 7 33.51
		W	...	12 2 17.0	2 5.5	45.30	46.90	.....	263 13 57.48	+ 1.61	- 0.62	+ 59.53	
16	ι Canum Venat.	W	2	12 8 29.0	1 40.7	44.45	46.55	.....	231 5 46.20	+ 1.25	- 9.75	+ 14.90	+53 58 28.59
	April 29, H.	E	...	12 12 22.0	2 12.3	48.50	49.30	.....	200 59 23.25	+ 3.92	+16.83	- 14.89	
17	4 Ursæ Minoris	W	...	14 6 8.0	3 21.4	49.35	49.25	.....	255 6 56.20	+ 1.18	- 5.67	+ 44.97	+78 0 12.17
		E	...	14 12 9.0	2 39.5	51.90	50.60	.....	176 58 24.78	+ 2.66	+ 3.56	- 44.95	
18	ξ Boötis	E	...	14 43 56.0	3 13.9	51.50	51.30	.....	235 28 12.75	+ 2.89	-45.22	+ 19.57	+19 30 6.47
		W	...	14 49 56.0	2 46.1	50.05	50.35	.....	196 37 13.72	+ 1.89	+33.18	- 19.57	
19	ζ Boötis	W	...	15 0 3.0	3 14.4	48.05	49.25	.....	202 21 17.90	+ 0.74	+11.32	- 13.51	+25 14 42.20
		E	...	15 5 53.0	2 35.5	51.30	50.65	.....	229 43 39.10	+ 2.39	-39.24	+ 13.50	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
28 11 30	...	67.4	30.041		1	216 2 41.04	...
11 36	64.6	...	...		2	40.90	...
11 44	...	66.9	30.036		3	38.64	- 4.28
11 50	64.7	...	...		4	40.21	+12.81
12 1	64.7	...	...		5	40.58	+13.25
12 16	65.3	66.4	30.041		6	41.20	+ 8.24
29 9 40	...	79.6	29.928		7	40.76	...
9 46	77.1	...	...		8	40.74	+12.20
9 58	76.1	...	...		9	42.02	...
10 8	75.8	...	...		10	41.72	...
10 17	75.1	77.0	29.928		11	41.61	...
10 18	75.1	...	...		12	41.08	...
10 55	74.0	...	...		13	40.24	+13.11
11 5	73.8	...	...		14	40.45	+10.56
11 14	...	75.9	29.930		15	41.14	- 4.50
11 28	74.5	...	...		16	40.86	+ 1.37
11 41	74.5	75.2	29.934		17	41.36	...
11 51	74.4	...	...		18	39.60	+ 5.96
12 0	74.1	...	...		19	41.10	+ 5.49
12 10	72.6	...	...		
12 16	...	74.2	29.927				
14 4	...	71.0	29.906				
14 9	71.8	...	...		
14 47	70.9	69.0	29.886				
15 1	71.1	...	...		

Note.
8. Hurried.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>''</i>	<i>° ' ''</i>	<i>''</i>	<i>' ''</i>	<i>' ''</i>	<i>° ' ''</i>
1	32 Libræ	E	...	15 18 47.0	4 15.6	52.50	50.95	...	271 19 55.45	+ 2.88	- 32.34	+1 19.91	-16 22 45.82
		W	...	15 25 54.0	2 51.4	51.55	50.85	...	160 45 43.35	+ 2.55	+ 14.55	-1 19.89	
2	θ Ursæ Minoris	W	...	15 31 17.0	3 15.9	51.20	50.50	...	254 46 58.55	+ 2.35	- 5.56	+ 44.95	+77 40 17.87
		E	...	15 37 15.0	2 42.1	51.70	51.30	...	177 18 16.45	+ 2.96	+ 3.80	- 44.95	
3	ρ Scorpil	E	...	15 48 30.0	2 39.4	51.50	51.50	...	283 51 36.78	+ 2.85	- 10.10	+2 16.92	-28 55 48.04
		W	...	15 53 23.0	2 13.6	51.45	51.45	...	148 13 42.52	+ 2.81	+ 7.10	-2 16.91	
4	ω ² Scorpil	W	...	15 58 37.0	3 21.6	50.65	50.40	...	156 32 15.80	+ 2.19	+ 18.73	-1 35.15	-20 36 23.10
		E	...	16 4 47.0	2 48.4	50.95	50.90	...	275 32 56.95	+ 2.45	- 13.07	+1 35.14	
5	σ Scorpil	E	...	16 12 14.0	3 19.2	52.20	51.70	...	280 17 47.68	+ 3.16	- 16.89	+1 56.22	-25 21 32.24
		W	...	16 18 9.0	2 35.8	52.55	51.25	...	151 47 34.80	+ 3.07	+ 10.33	-1 56.21	
6	34 Herculis	W	...	16 24 34.0	3 7.2	51.55	50.60	...	226 18 18.60	+ 2.55	- 54.58	+ 10.22	+49 10 13.71
		E	...	16 30 28.0	2 46.8	50.75	50.55	...	205 47 7.72	+ 2.22	+ 43.35	- 10.22	
7	18 Ophiuchi	E	...	16 40 40.0	3 16.7	51.55	51.40	...	279 24 27.98	+ 2.93	- 16.71	+1 52.02	-24 28 8.97
		W	...	16 46 50.0	2 44.3	53.15	51.90	...	152 40 51.32	+ 3.62	+ 11.66	-1 52.01	
8	May 1, E. 24 Cephei S. P.	E	2	10 5 38.0	2 37.2	48.10	45.30	...	146 52 13.58	+ 0.63	- 3.49	-2 32.06	+71 51 40.56
		W	...	10 10 54.0	2 38.8	55.00	50.30	...	285 13 3.12	+ 5.06	+ 3.56	+2 32.08	
9	32 H. Cephei S. P.	W	2	10 18 24.0	2 58.0	55.40	50.30	...	271 28 46.12	+ 5.22	+ 1.25	+1 24.50	+85 37 6.24
		E	...	10 24 10.0	2 48.0	47.90	46.35	...	160 36 27.90	+ 1.04	- 1.11	-1 24.53	
10	37 Leonis Minoris	E	3	10 30 38.0	2 57.4	49.05	47.05	...	222 30 47.70	+ 1.69	-1 40.16	+ 6.62	+32 28 41.22
		W	...	10 36 27.0	2 51.6	54.95	50.10	...	209 34 32.42	+ 5.01	+1 33.75	- 6.62	
11	d Leonis	E	2	10 52 52.0	3 0.8	48.45	46.10	...	250 40 35.65	+ 0.93	- 24.25	+ 40.58	+ 4 8 4.12
		W	...	10 58 14.0	2 21.2	54.45	50.00	...	181 15 48.58	+ 4.64	+ 14.79	- 40.57	
12	π Cephei S. P.	W	2	11 2 27.0	2 39.7	53.85	49.65	...	282 13 24.55	+ 4.34	+ 3.08	+2 11.63	+74 51 40.24
		E	...	11 7 49.0	2 42.3	47.75	45.90	...	149 51 52.02	+ 0.59	- 3.18	-2 11.63	
13	83 Leonis	E	2	11 10 10.0	3 0.6	48.70	46.35	...	251 25 23.08	+ 1.15	- 23.86	+ 41.59	+ 3 32 15.20
		W	...	11 25 0.0	2 49.4	54.65	49.80	...	180 39 54.65	+ 4.58	+ 20.99	- 41.59	
14	o Hydræ	W	3	11 33 12.0	2 32.1	52.90	49.15	...	142 57 34.68	+ 3.79	+ 8.48	-3 10.32	-34 12 48.22
		E	...	11 38 8.0	2 23.9	47.55	46.15	...	289 7 43.38	+ 0.67	- 7.59	+3 10.34	
15	298 G. Hydræ	E	3	11 41 38.0	2 33.4	48.45	46.55	...	281 8 58.02	+ 1.24	- 9.87	+2 5.69	-26 12 57.06
		W	...	11 46 40.0	2 28.6	54.10	49.50	...	150 56 19.18	+ 4.49	+ 9.27	-2 5.69	
16	b Virginis	W	2	11 52 41.0	2 37.9	52.30	48.90	...	181 19 12.28	+ 3.53	+ 18.52	- 40.62	+ 4 11 29.14
		E	...	11 57 42.0	2 23.1	47.60	45.85	...	250 46 2.98	+ 0.75	- 15.21	+ 40.62	
17	10 Virginis	E	2	12 2 31.0	2 32.2	47.70	45.70	...	252 31 10.68	+ 0.56	- 16.52	+ 43.33	+ 2 26 20.49
		W	...	12 7 28.0	2 24.8	53.40	49.30	...	179 34 9.48	+ 4.20	+ 14.95	- 43.32	
18	5 B. Ursæ Minoris	W	2	12 11 24.0	3 4.3	52.50	49.00	...	264 4 50.98	+ 3.69	- 1.02	+1 5.22	+86 58 33.08
		E	...	12 17 19.0	2 50.7	48.70	47.05	...	168 0 29.15	+ 1.62	+ 0.88	-1 5.21	

Time	Ther- m.	Alt- ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1903 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm</i>						<i>° ' ''</i>	<i>''</i>
29 11 11	55.8	71.0	29.896					1	216 2 43.21	
11 21	55.8							2	39.28	+ 2.91
11 34	56.1							3	40.47	- 0.48
11 45	56.1	65.0	29.898					4	41.52	- 0.19
11 51	56.0							5	41.68	
11 53	56.0							6	39.91	+ 5.40
11 54	56.0							7	40.40	- 4.09
11 55	56.0	64.1	29.890					8	41.24	
11 56	56.0							9	40.20	+ 1.46
11 57	56.0	64.2	29.898					10	40.20	+ 6.50
11 58	56.0	53.8	29.132					11	40.18	
11 59	56.0							12	40.70	
12 00	56.0							13	40.10	
12 01	56.0	61.4	29.144					14	41.71	+ 22.11
12 02	56.0							15	41.16	+ 26.46
12 03	56.0	51.6	29.156					16	41.42	+ 13.15
12 04	56.0							17	41.68	+ 13.44
12 05	56.0							18	41.66	- 4.04

Notes

1 E. Clock time decreased 10".
2 E. One microscope reading increased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	May 2, H. 36 H. Cephei s. p.	E W	...	10 52 2.0 10 58 17.0	3 28.7 2 46.3	50.35 53.15	47.00 49.10	.....	158 48 58.68 273 16 16.58	+ 0.97 + 2.83	- 2.37 + 1.50	- 1 30.17 + 1 30.16	+ 83 49 31.16
2	π Cephei s. p.	W E	...	11 2 51.0 11 7 44.0	2 18.2 2 34.8	53.85 50.85	49.25 46.90	.....	282 13 27.02 149 51 50.28	+ 3.14 + 1.09	+ 2.31 - 2.90	+ 2 11.10 - 2 11.09	+ 74 51 40.04
3	39 H. Cephei s. p.	E W	...	11 24 50.0 11 30 48.0	3 13.8 2 44.2	49.50 53.40	46.50 49.05	.....	161 45 32.85 270 19 43.02	+ 0.47 + 2.91	- 1.10 + 0.79	- 1 20.87 + 1 20.87	+ 86 46 15.02
4	ζ Crateris	W E	...	11 36 39.0 11 42 53.0	3 34.3 2 39.7	53.50 49.45	48.85 46.40	.....	159 19 26.90 272 45 40.70	+ 2.84 + 0.41	+ 22.19 - 12.32	- 1 28.66 + 1 28.65	- 17 49 0.22
5	<i>b</i> Virginis	E W	...	11 51 59.0 11 57 54.0	3 22.3 2 32.7	49.95 53.00	46.50 48.70	.....	250 46 15.28 181 19 11.90	+ 0.59 + 2.60	- 30.40 + 17.32	+ 40.43 - 40.42	+ 4 11 29.61
6	318 B. Cephei s. p.	W E	...	12 7 44.0 12 13 41.0	3 19.1 2 37.9	52.45 50.40	48.65 46.65	.....	280 40 36.68 151 24 39.45	+ 2.40 + 0.81	+ 4.38 - 2.75	+ 2 2.47 - 2 2.47	+ 76 24 37.70
7	May 4, E. 193 G. Hydræ	E W	2	9 58 45.0 10 2 44.0	1 34.9 2 24.1	49.25 50.95	50.40 51.45	.....	278 45 28.12 153 19 38.72	+ 2.46 + 3.45	- 3.93 + 9.07	+ 1 50.38 - 1 50.39	- 23 49 21.23
8	138 B. Ursæ Majoris	W E	2	10 11 20.0 10 17 44.0	3 13.6 3 1.4	48.90 47.90	50.40 49.80	.....	231 49 50.82 200 15 27.02	+ 2.26 + 1.77	- 33.78 + 29.66	+ 16.18 - 16.18	+ 54 42 13.46
9	226 B. Cephei s. p.	E W	3	10 27 56.0 10 33 53.0	3 5.0 2 52.0	46.60 49.90	49.10 51.35	.....	150 43 31.45 281 21 42.82	+ 1.01 + 3.06	- 3.94 + 3.41	- 2 4.10 + 2 4.10	+ 75 43 28.66
10	37 Sextantis	W E	3	10 38 39.0 10 44 3.0	2 51.5 2 32.5	49.85 45.45	51.30 48.10	.....	184 0 23.72 248 4 49.32	+ 3.37 + 0.36	+ 23.35 - 18.47	- 35.91 + 35.90	+ 6 52 50.57
11	36 H. Cephei s. p.	E W	4	10 52 22.0 10 58 22.0	3 14.8 3 45.2	45.35 49.65	48.25 51.15	.....	158 48 57.32 273 16 18.60	+ 0.36 + 3.27	- 2.06 + 2.75	- 1 29.00 + 1 29.01	+ 83 49 29.64
12	ϕ Leonis	W E	3	11 9 25.0 11 14 48.0	2 46.9 2 36.1	49.30 46.65	50.75 49.00	.....	174 0 22.78 258 4 53.75	+ 2.95 + 1.14	+ 17.62 - 15.41	- 51.74 + 51.74	- 3 7 32.94
13	<i>e</i> Leonis	E W	2	11 23 12.0 11 28 14.0	2 37.7 2 24.3	47.55 49.90	49.95 51.00	.....	257 25 42.25 174 39 35.20	+ 1.66 + 2.93	- 15.94 + 13.35	+ 50.64 - 50.64	- 2 28 22.02
14	γ Cephei s. p.	W E	3	11 32 44.0 11 38 36.0	3 3.8 2 48.2	49.25 48.05	50.20 50.10	.....	279 59 56.25 152 5 17.35	+ 2.25 + 1.99	+ 3.56 - 2.98	+ 1 57.21 - 1 57.20	+ 77 5 23.08
15	298 G. Hydræ	E W	3	11 42 29.0 11 46 36.0	1 50.6 2 16.4	48.35 50.10	50.20 50.65	.....	281 8 52.28 150 56 19.28	+ 2.26 + 3.16	- 5.13 + 7.81	+ 2 3.50 - 2 3.50	- 26 12 56.22
16	<i>b</i> Virginis	W E	3	11 52 15.0 11 58 19.0	3 12.0 2 52.0	48.75 48.00	49.80 49.65	.....	181 19 3.40 250 46 7.88	+ 2.13 + 2.08	+ 27.38 - 21.98	- 39.94 + 39.94	+ 4 11 29.38
17	10 Virginis	E W	2	12 3 0.0 12 7 0.0	2 11.3 1 48.7	49.00 49.75	50.45 50.45	.....	252 31 4.95 179 34 15.28	+ 2.53 + 2.97	- 12.29 + 8.43	+ 42.59 - 42.60	+ 2 26 20.01
18	<i>c</i> Virginis	W E	3	12 13 1.0 12 18 21.0	2 52.7 2 27.3	48.55 47.65	49.85 49.45	.....	180 58 36.75 251 6 33.68	+ 2.22 + 1.76	+ 21.98 - 15.90	- 40.49 + 40.49	+ 3 50 57.12

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1003.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
2 10 44	.....	53.0	30.114		1	216 2 39.09	+ 7.27
10 55	51.0	.....	.....		2	40.48	.....
11 5	50.9	.....	.....		3	39.47	.....
11 13	.....	53.0	30.108		4	40.36	.....
11 28	50.3	.....	.....		5	38.65	+ 13.33
11 40	49.7	.....	.....		6	40.48	+ 6.32
11 46	.....	52.5	30.108		7	38.94	+ 24.64
11 55	49.4	.....	.....		8	38.88	- 0.51
12 11	49.6	.....	.....		9	38.90	.....
12 19	.....	50.5	30.102		10	40.82	.....
4 9 50	.....	61.0	29.953		11	40.12	+ 7.50
10 1	57.0	.....	.....		12	41.42	+ 16.68
10 15	50.5	.....	.....		13	39.72	+ 16.03
10 24	.....	58.8	29.956		14	39.22	.....
10 31	55.7	.....	.....		15	39.83	+ 20.72
10 41	55.1	.....	.....		16	40.44	+ 13.22
10 55	54.7	52.5	29.951		17	40.93	+ 13.32
11 12	55.0	.....	.....		18	40.20	+ 12.58
11 26	54.3	56.8	29.955				
11 36	53.9	.....	.....		
11 45	51.3	.....	.....		
11 55	52.9	.....	.....		
12 5	52.9	.....	.....		
12 16	52.6	51	29.954				

Note.
14 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>		<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	May 5, E. Crateris	E W	3 ...	10 52 40.0 10 57 31.0	2 26.4 2 24.6	49.00 48.40	50.40 49.55	...	272 43 53.42 159 21 21.70	+ 1.44 + 0.87	-10.36 +10.11	+1 26.56 -1 26.57	-17 47 15.02
2	ε Cephei S. P.	W E	3 ...	11 2 9.0 11 7 39.0	2 41.7 2 48.3	47.80 48.00	49.65 49.75	...	282 13 27.98 149 51 47.48	+ 0.73 + 1.02	+ 3.16 - 3.43	+2 8.42 -2 8.44	+74 51 41.31
3	39 H. Cephei S. P.	E W	3 ...	11 24 46.0 11 30 56.0	3 0.0 3 10.0	48.35 49.95	49.35 50.60	...	161 45 28.70 270 19 45.35	+ 0.75 + 1.84	- 0.95 + 1.06	-1 10.27 +1 10.27	+80 40 14.00
4	2 Virginis	W E	3 ...	11 38 29.0 11 43 19.0	2 27.1 2 22.9	49.00 47.65	50.50 48.60	...	184 11 48.65 247 53 25.05	+ 1.78 + 0.18	+17.27 -16.30	- 35.51 + 35.51	+7 4 10.74
5	Groombridge 4163 S. P.	E W	3 ...	11 47 12.0 11 53 17.0	2 56.1 3 8.9	47.75 49.45	48.75 50.40	...	148 52 22.22 283 12 54.68	+ 0.32 + 1.02	- 3.96 + 4.50	-2 15.17 +2 15.15	+73 52 6.84
6	128 H ¹ . Camelop.	W E	2 ...	11 58 17.0 12 2 25.0	1 42.6 2 25.3	49.50 48.30	50.25 49.10	...	263 13 54.02 168 51 20.65	+ 1.53 + 0.62	- 0.41 + 0.82	+1 1.72 -1 1.72	+86 7 35.10
7	1 Canum Venat.	E W	3 ...	12 7 22.0 12 12 29.0	2 37.0 2 30.0	47.65 48.70	48.50 49.95	...	200 50 17.70 231 5 55.80	+ 0.13 + 1.13	+23.68 -21.62	- 15.42 + 15.42	+53 58 29.18
8	20 Comæ Berenices	W E	3 ...	12 21 48.0 12 27 47.0	3 5.8 2 53.2	48.20 47.35	49.10 48.70	...	198 32 44.25 233 32 24.92	+ 0.61 + 0.16	+45.35 -39.42	- 18.08 + 18.07	+21 25 51.00
9	d ² Virginis	E W	3 ...	12 37 52.0 12 43 32.0	2 55.0 2 44.9	48.05 48.05	49.20 49.75	...	246 45 43.62 185 10 33.62	+ 0.58 + 1.13	-25.18 +22.36	+ 34.10 - 34.10	+ 8 12 1.80
10	φ Virginis	W E	3 ...	12 47 17.0 12 52 22.0	2 5.8 2 59.2	48.75 47.30	49.55 48.60	...	168 7 17.55 203 58 7.00	+ 0.97 + 0.12	+ 8.94 -18.13	-1 3.53 +1 3.53	9 0 57.44
11	May 5, H. Virginis	E W	...	13 58 5.0 14 4 8.0	3 9.1 2 53.9	49.25 50.05	49.90 50.05	...	263 23 4.65 168 42 13.00	+ 1.33 + 1.80	-20.41 +17.26	+1 2.50 -1 2.50	8 25 52.40
12	3 G. Libræ	W E	...	14 16 22.0 14 22 13.0	2 59.4 2 51.5	48.20 47.80	49.00 48.75	...	152 46 54.80 279 18 17.90	+ 0.60 + 0.47	+13.93 -12.72	-1 54.02 +1 54.01	-24 22 5.32
13	6 B. Libræ	E W	...	14 28 50.0 14 34 47.0	3 4.9 2 52.1	48.25 48.70	48.90 49.50	...	266 50 43.40 165 14 33.70	+ 0.60 + 1.06	-18.31 +15.87	+1 10.63 -1 10.63	-11 53 41.30
14	μ Libræ	W E	...	14 41 3.0 14 47 0.0	3 1.8 2 55.2	48.65 47.35	49.15 48.70	...	163 23 32.58 208 41 43.40	+ 0.70 + 0.05	+17.13 -15.91	-1 15.51 +1 15.51	-13 44 47.22
15	δ Libræ	E W	...	14 53 49.0 14 58 39.0	2 3.1 2 46.8	47.45 49.80	48.50 49.85	...	263 5 8.18 168 50 59.38	+ 0.08 + 1.31	- 8.70 +15.97	+1 2.00 -1 2.00	- 8 8 6.59
16	1 Lupi	W E	...	15 5 48.0 15 11 33.0	2 58.0 2 47.0	48.65 47.55	49.30 49.05	...	146 0 17.52 286 4 57.20	+ 1.00 + 0.41	+12.24 -10.77	-2 37.85 +2 37.84	-31 9 28.98
17	32 Libræ	E W	...	15 19 44.0 15 25 39.0	3 8.1 2 49.9	48.55 50.05	49.15 49.75	...	271 19 33.55 160 45 44.08	+ 0.68 + 1.39	-17.52 +13.79	+1 23.24 -1 23.24	-16 22 45.10
18	κ Libræ	W E	...	15 33 21.0 15 39 23.0	3 5.5 2 56.5	48.70 47.85	49.20 49.10	...	157 46 44.22 274 18 30.00	+ 0.88 + 0.61	+16.20 -14.66	-1 33.21 +1 33.21	-19 21 55.68

Time	Ther- m.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.	No	Zenith point.	Red. to 1903 o.
5 58 39	58.6	58.7	29.971		1	210 2 28 58	
5 59 49	58.6	58.7	29.971		2	210 2 28 58	
6 0 59	58.6	58.7	29.971		3	210 2 28 58	
6 1 10	58.6	58.7	29.971		4	210 2 28 58	+ 12.82
6 2 20	58.6	58.7	29.971		5	210 2 28 58	
6 3 30	58.6	58.7	29.971		6	210 2 28 58	- 5.05
6 4 40	58.6	58.7	29.971		7	210 2 28 58	+ 0.44
6 5 50	58.6	58.7	29.971		8	210 2 28 58	
7 0 10	58.6	58.7	29.971		9	210 2 28 58	+ 10.60
7 1 20	58.6	58.7	29.971		10	210 2 28 58	+ 11.60
7 2 30	58.6	58.7	29.971		11	210 2 28 58	
7 3 40	58.6	58.7	29.971		12	210 2 28 58	+ 8.64
7 4 50	58.6	58.7	29.971		13	210 2 28 58	+ 7.31
7 5 10	58.6	58.7	29.971		14	210 2 28 58	+ 6.48
7 6 20	58.6	58.7	29.971		15	210 2 28 58	+ 5.49
7 7 30	58.6	58.7	29.971		16	210 2 28 58	+ 3.97
7 8 40	58.6	58.7	29.971		17	210 2 28 58	
7 9 50	58.6	58.7	29.971		18	210 2 28 58	
Notes.							
1 E. & E. One microscope reading decreased 10'.							
1 E. One microscope reading increased 10'.							
A. Thermometer reading increased 0.1°.							
7 10 10	58.6	58.7	29.971				
7 11 20	58.6	58.7	29.971				
7 12 30	58.6	58.7	29.971				
7 13 40	58.6	58.7	29.971				
7 14 50	58.6	58.7	29.971				
7 15 10	58.6	58.7	29.971				
7 16 20	58.6	58.7	29.971				
7 17 30	58.6	58.7	29.971				
7 18 40	58.6	58.7	29.971				
7 19 50	58.6	58.7	29.971				
7 20 10	58.6	58.7	29.971				
7 21 20	58.6	58.7	29.971				
7 22 30	58.6	58.7	29.971				
7 23 40	58.6	58.7	29.971				
7 24 50	58.6	58.7	29.971				
7 25 10	58.6	58.7	29.971				
7 26 20	58.6	58.7	29.971				
7 27 30	58.6	58.7	29.971				
7 28 40	58.6	58.7	29.971				
7 29 50	58.6	58.7	29.971				
7 30 10	58.6	58.7	29.971				
7 31 20	58.6	58.7	29.971				
7 32 30	58.6	58.7	29.971				
7 33 40	58.6	58.7	29.971				
7 34 50	58.6	58.7	29.971				
7 35 10	58.6	58.7	29.971				
7 36 20	58.6	58.7	29.971				
7 37 30	58.6	58.7	29.971				
7 38 40	58.6	58.7	29.971				
7 39 50	58.6	58.7	29.971				
7 40 10	58.6	58.7	29.971				
7 41 20	58.6	58.7	29.971				
7 42 30	58.6	58.7	29.971				
7 43 40	58.6	58.7	29.971				
7 44 50	58.6	58.7	29.971				
7 45 10	58.6	58.7	29.971				
7 46 20	58.6	58.7	29.971				
7 47 30	58.6	58.7	29.971				
7 48 40	58.6	58.7	29.971				
7 49 50	58.6	58.7	29.971				
7 50 10	58.6	58.7	29.971				
7 51 20	58.6	58.7	29.971				
7 52 30	58.6	58.7	29.971				
7 53 40	58.6	58.7	29.971				
7 54 50	58.6	58.7	29.971				
7 55 10	58.6	58.7	29.971				
7 56 20	58.6	58.7	29.971				
7 57 30	58.6	58.7	29.971				
7 58 40	58.6	58.7	29.971				
7 59 50	58.6	58.7	29.971				
8 0 10	58.6	58.7	29.971				
8 0 20	58.6	58.7	29.971				
8 0 30	58.6	58.7	29.971				
8 0 40	58.6	58.7	29.971				
8 0 50	58.6	58.7	29.971				
8 1 00	58.6	58.7	29.971				
8 1 10	58.6	58.7	29.971				
8 1 20	58.6	58.7	29.971				
8 1 30	58.6	58.7	29.971				
8 1 40	58.6	58.7	29.971				
8 1 50	58.6	58.7	29.971				
8 2 00	58.6	58.7	29.971				
8 2 10	58.6	58.7	29.971				
8 2 20	58.6	58.7	29.971				
8 2 30	58.6	58.7	29.971				
8 2 40	58.6	58.7	29.971				
8 2 50	58.6	58.7	29.971				
8 3 00	58.6	58.7	29.971				
8 3 10	58.6	58.7	29.971				
8 3 20	58.6	58.7	29.971				
8 3 30	58.6	58.7	29.971				
8 3 40	58.6	58.7	29.971				
8 3 50	58.6	58.7	29.971				
8 4 00	58.6	58.7	29.971				
8 4 10	58.6	58.7	29.971				
8 4 20	58.6	58.7	29.971				
8 4 30	58.6	58.7	29.971				
8 4 40	58.6	58.7	29.971				
8 4 50	58.6	58.7	29.971				
8 5 00	58.6	58.7	29.971				
8 5 10	58.6	58.7	29.971				
8 5 20	58.6	58.7	29.971				
8 5 30	58.6	58.7	29.971				
8 5 40	58.6	58.7	29.971				
8 5 50	58.6	58.7	29.971				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Scorpii	E	...	15 47 57.0	3 2.0	47.95	49.00	.....	283 51 38.42	+ 0.39	-13.28	+2 20.77	-28 55 51.48
		W	...	15 54 2.0	3 3.0	49.65	49.80	.....	148 13 35.65	+ 1.31	+13.43	-2 20.77	
2	κ Herculis	W	...	16 0 42.0	3 4.4	48.80	49.20	.....	194 25 19.85	+ 0.81	+37.38	- 22.91	+17 18 15.42
		E	...	16 6 37.0	2 50.5	47.45	48.45	.....	237 39 47.12	- 0.05	-31.97	+ 22.91	
3	σ Serpentis	E	...	16 13 6.0	4 8.4	47.95	48.80	.....	253 42 31.92	+ 0.49	-42.84	+ 44.54	+ 1 15 22.12
		W	...	16 20 12.0	2 57.6	49.25	49.60	.....	178 23 6.08	+ 1.19	+21.90	- 44.53	
4	24 Scorpii	W	...	16 33 49.0	2 13.8	48.60	49.25	.....	159 35 24.92	+ 0.75	+ 8.69	-1 26.93	-17 33 13.52
	May 6, E.	E	...	16 39 7.0	3 4.2	47.20	48.60	.....	272 29 57.82	- 0.08	-16.47	+1 26.93	
5	29 H. Camelop.	E	2	10 12 37.0	3 7.1	49.85	49.75	.....	170 13 58.90	+ 2.65	+ 1.90	- 57.69	+84 44 48.78
		W	...	10 18 30.0	2 45.9	45.70	47.75	.....	261 51 12.92	+ 0.48	- 1.49	+ 57.69	
6	44 Hydræ	W	3	10 27 0.0	2 30.5	45.60	47.55	.....	153 53 53.22	+ 0.27	+ 9.99	-1 45.86	-23 15 4.71
		E	...	10 31 50.0	2 19.5	47.90	48.75	.....	278 11 21.85	+ 1.63	- 8.58	+1 45.86	
7	34 Sextantis	E	3	10 35 33.0	2 10.3	48.50	49.50	.....	250 52 17.98	+ 2.30	-12.58	+ 39.09	+ 4 5 8.94
		W	...	10 39 35.0	1 51.7	46.55	47.75	.....	181 13 0.00	+ 0.78	+ 9.25	- 39.09	
8	Groombridge 4163 S.P.	W	3	11 47 8.0	3 3.0	46.85	48.15	.....	283 12 56.82	+ 1.07	+ 4.29	+2 13.54	+73 52 6.34
		E	...	11 53 6.0	2 55.0	48.10	48.85	.....	148 52 17.72	+ 1.86	- 3.92	-2 13.54	
9	128 H ¹ . Camelop.	E	2	11 57 44.0	3 18.3	47.95	48.85	.....	168 51 19.45	+ 1.70	+ 1.53	-1 1.01	+86 7 34.03
		W	...	12 2 28.0	2 25.7	47.60	48.30	.....	263 13 54.58	+ 1.25	- 0.83	+1 1.01	
10	23 Comæ Berenices	E	4	12 27 4.0	3 3.8	48.90	48.95	.....	231 48 43.35	+ 2.11	-48.51	+ 16.03	+23 9 41.52
		W	...	12 32 45.0	2 37.2	47.95	48.35	.....	200 16 41.32	+ 1.54	+35.48	- 16.03	
11	d^2 Virginis	W	3	12 37 34.0	3 15.8	46.65	47.55	.....	185 19 26.62	+ 0.66	+31.51	- 33.70	+ 8 12 3.30
	May 7, H.	E	...	12 43 54.0	3 4.2	47.75	48.45	.....	246 45 45.02	+ 1.39	-27.90	+ 33.69	
12	0 Leonis	E	...	11 47 43.0	3 7.9	46.75	49.90	.....	238 47 4.48	+ 2.91	-37.22	+ 23.59	+16 11 2.76
		W	...	11 53 43.0	2 52.1	45.65	49.00	.....	193 18 15.75	+ 2.16	+31.22	- 23.58	
13	1 Canum Venat.	W	...	12 6 57.0	3 7.8	43.45	47.75	.....	231 6 7.12	+ 0.89	-33.88	+ 15.16	+53 58 26.90
		E	...	12 13 5.0	3 0.2	45.85	49.75	.....	200 59 10.62	+ 2.55	+31.20	- 15.16	
14	23 Comæ Berenices	E	...	12 27 0.0	3 10.8	50.30	50.80	.....	231 48 44.78	+ 4.45	-52.27	+ 15.95	+23 9 41.80
		W	...	12 33 5.0	2 54.1	46.75	48.65	.....	200 16 32.90	+ 2.32	+43.51	- 15.95	
15	35 Virginis	W	...	12 39 52.0	3 13.0	45.25	47.90	.....	181 13 32.15	+ 1.47	+27.61	- 39.30	+ 4 5 57.45
		E	...	12 45 59.0	2 54.0	47.10	49.75	.....	250 51 40.95	+ 2.93	-22.44	+ 39.31	
16	1 B Ursæ Minoris S.P.	E	...	12 53 38.0	2 40.4	49.20	50.05	.....	163 29 15.82	+ 3.73	- 0.36	-1 13.75	+88 30 8.40
		W	...	12 59 24.0	3 5.6	46.75	48.85	.....	268 35 58.28	+ 2.38	+ 0.48	+1 13.77	
17	r . Centauri	W	...	13 8 31.0	3 9.4	44.80	47.50	.....	146 9 52.02	+ 1.12	+13.89	-2 33.52	-30 59 49.09
		E	...	13 14 40.0	2 59.6	46.05	49.25	.....	285 55 21.98	+ 2.38	-12.49	+2 33.54	
18	70 Virginis	E	...	13 20 39.0	3 12.2	48.40	50.50	.....	240 40 23.45	+ 3.73	-36.45	+ 26.01	+14 17 40.60
		W	...	13 25 46.0	1 54.8	47.20	48.80	.....	191 25 14.70	+ 2.52	+13.01	- 26.01	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903 0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
5 15 44	...	54.5	29.970					1	216 2 37.96	+ 0.17
15 51	52.1	...	...					2	36.57	
16 4	52.0	...	...					3	39.38	+ 1.36
16 17	52.4	54.5	29.964					4	37.82	- 2.06
16 36	52.0	...	...					5	37.68	
16 44	54.5	29.956*	...					6	39.19	+23.00
6 10 8	...	68.0	29.905					7	38.86	
10 16	65.4	...	...					8	38.92	
10 29	65.0	...	...					9	38.84	- 5.91
10 38	64.6	...	...					10	37.64	
11 40	...	64.8	29.904					11	38.64	+10.48
11 50	61.4	...	...					12	39.66	+ 9.73
12 0	61.4	...	...					13	39.25	- 0.36
12 10	60.0	...	...					14	37.84	
12 41	60.1	...	...					15	41.34	
12 48	...	62.2	29.904					16	40.18	+ 5.54
7 11 40	...	66.0	29.891†					17	39.46	+15.13
12 10	63.1	...	...					18	40.48	
12 19	...	65.0	29.874							
12 30	62.0	...	...					
12 41	61.3	...	...					
12 50	...	63.0	29.882							
12 57	61.1	...	...					
13 12	59.9	...	...					
13 23	59.8	...	...					

Notes.

- 4 E. One level reading decreased 10 div.
5 E. One microscope reading increased 10".
8 E. One microscope reading decreased 10".
11. Clouds.
11 E. Clock time increased 5m.
17 E. One level reading increased 5 div.
* Barometer reading changed from 29.506 to 29.956 in.
† Barometer reading changed from 29.991 to 29.891 in.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>		<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	<i>i</i> Centauri	W	...	13 37 13.0	3 7.2	44.15	47.30	...	144 36 34.35	+ 0.87	+ 13.22	-2 47.57	-32 33 22.20
		E	...	13 44 10.0	3 49.8	40.90	49.05	...	287 28 48.45	+ 2.85	- 19.92	+2 47.60	
2	<i>o</i> H. Boötis	W	...	14 2 20.0	1 47.2	45.25	47.85	...	221 26 48.85	+ 1.48	- 37.09	+ 5.40	+44 18 54.49
	May 8, H.	E	...	14 0 55.0	2 41.8	47.25	49.85	...	210 37 41.38	+ 3.03	+ 24.38	- 5.41	
3	<i>n</i> Leonis	E	...	11 7 48.0	3 11.6	40.90	50.70	...	241 8 0.40	+ 2.02	- 35.67	+ 26.55	-13 50 1.20
		W	...	11 13 51.0	2 51.4	48.85	49.75	...	190 57 19.18	+ 0.94	+ 28.54	- 26.55	
4	<i>e</i> Leonis	W	...	11 22 20.0	3 13.8	46.85	48.75	...	174 39 26.08	- 0.17	+ 24.08	- 50.03	- 2 28 21.03
		E	...	11 28 14.0	2 40.2	47.45	49.55	...	257 25 41.85	+ 0.33	- 16.46	+ 50.02	
5	<i>z</i> Crateris	E	...	11 30 50.0	3 7.3	48.90	50.50	...	272 45 42.60	+ 1.23	- 16.95	+ 26.40	-17 48 59.04
		W	...	11 43 7.0	3 3.7	48.50	49.05	...	159 19 30.85	+ 0.73	+ 16.30	- 26.41	
6	<i>o</i> Leonis	W	...	11 48 0.0	2 47.5	47.25	49.30	...	103 18 10.58	+ 0.48	- 29.57	- 23.83	+10 11 2.54
		E	...	11 53 50.0	2 56.5	47.35	49.05	...	238 47 0.25	+ 0.21	- 32.84	+ 23.83	
7	318 B. Cephei s.p.	E	...	12 7 50.0	3 3.5	47.80	49.45	...	151 24 33.02	+ 0.65	- 3.72	- 50.52	+70 24 36.94
		W	...	12 14 25.0	3 51.5	47.85	49.75	...	280 40 40.20	+ 0.78	+ 4.93	+ 59.52	
8	33 H ¹ . Virginis	W	...	12 20 50.0	2 6.5	47.45	49.20	...	173 3 8.40	+ 0.28	+ 9.93	- 53.13	- 4 4 56.32
		E	...	12 20 8.0	3 2.5	47.50	49.20	...	259 2 18.88	+ 0.49	- 20.67	+ 53.14	
9	<i>z</i> Virginis	E	...	12 31 7.0	3 20.0	47.15	49.05	...	262 25 14.20	+ 0.09	- 23.25	+ 59.80	- 7 27 55.50
		W	...	12 38 0.0	3 39.0	48.25	49.70	...	109 39 57.45	+ 0.59	+ 27.87	- 59.80	
10	<i>z</i> Virginis	W	...	12 40 14.0	3 17.2	47.00	49.40	...	168 7 5.72	+ 0.43	+ 21.95	- 3.20	0 0 56.00
	May 9, H.	E	...	12 52 20.0	2 54.8	47.25	49.20	...	263 58 4.20	+ 0.46	- 17.25	+ 3.20	
11	54 Leonis	E	...	10 47 19.0	3 15.4	49.50	50.95	...	229 42 47.50	+ 2.40	- 2.02	+ 13.09	+25 15 52.99
		W	...	10 53 11.0	2 36.6	47.55	49.45	...	202 22 46.60	+ 1.08	+ 39.84	- 13.09	
12	<i>z</i> Hydrae	W	...	10 57 40.0	3 0.5	47.45	49.25	...	150 22 35.38	+ 0.98	+ 14.46	- 2 3.84	-26 46 33.72
		E	...	11 3 47.0	2 54.5	48.45	50.25	...	281 42 35.20	+ 1.76	- 12.60	+ 2 3.84	
13	<i>o</i> Leonis	E	...	11 8 46.0	3 10.7	48.25	50.40	...	258 4 58.45	+ 1.74	- 23.00	+ 50.82	- 3 7 32.21
		W	...	11 14 48.0	2 51.5	47.80	49.10	...	174 0 21.10	+ 1.03	+ 18.56	- 50.82	
14	29 H. Cephei s.p.	W	...	11 24 52.0	3 4.7	40.40	49.00	...	270 19 46.40	+ 0.40	+ 1.00	+ 18.25	+86 46 15.80
		E	...	11 30 49.0	2 52.3	48.35	50.00	...	101 45 28.98	+ 1.52	- 0.87	- 18.25	
15	<i>z</i> Virginis	E	...	11 37 49.0	3 16.4	48.40	50.15	...	247 53 38.58	+ 1.59	- 30.78	+ 35.06	+ 7 4 10.40
		W	...	11 43 50.0	2 44.6	48.20	49.80	...	184 11 43.02	+ 1.35	+ 21.62	- 35.07	
16	<i>b</i> Virginis	W	...	11 51 56.0	3 15.9	46.50	48.95	...	181 19 1.95	+ 0.49	+ 28.51	- 39.19	+ 4 11 30.72
		E	...	11 57 52.0	2 40.1	47.10	49.00	...	250 46 2.80	+ 1.10	- 19.04	+ 39.19	
17	5 B. Ursae Minoris	E	...	12 11 3.0	3 10.2	47.85	49.50	...	168 0 21.80	+ 1.24	+ 1.16	- 2.99	+86 58 34.90
		W	...	12 10 1.0	1 41.8	47.45	49.50	...	264 4 53.55	+ 1.00	- 0.31	+ 2.99	
18	<i>f</i> Virginis	W	...	12 28 37.0	3 23.9	46.00	48.95	...	171 49 47.45	+ 0.43	+ 25.19	- 55.20	- 5 18 3.70
		E	...	12 34 42.0	2 41.1	47.05	49.75	...	260 15 18.65	+ 1.01	- 15.72	+ 55.18	

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point	Red. to 1903.0
2 28.26	59.0	62.5	29.926						1	210 2 19.92	+ 12.69
2 34.44	59.0	62.5	29.926						2	11 01	+ 2.26
2 41.11	59.0	61.0	29.926						3	12 50	+ 11.39
2 47.22	59.0	61.0	29.926						4	17 54	+ 11.70
2 53.33	59.0	61.0	29.926						5	17 48	
3 0.44	59.0	61.0	29.926						6	12 12	+ 9.60
3 6.55	59.0	61.0	29.926						7	19 23	+ 7.19
3 13.66	59.0	61.0	29.926						8	18 06	+ 13.81
3 20.77	59.0	61.0	29.926						9	15 48	+ 14.41
3 27.88	59.0	61.0	29.926						10	12 20	+ 14.49
3 34.99	59.0	61.0	29.926						11	12 29	+ 2.41
3 42.10	59.0	61.0	29.926						12	12 46	+ 13.27
3 49.21	59.0	61.0	29.926						13	18 04	+ 16.48
3 56.32	59.0	61.0	29.926						14	18 12	
4 0.43	59.0	61.0	29.926						15	12 28	+ 12.40
4 07.54	59.0	61.0	29.926						16	12 09	+ 13.77
4 14.65	59.0	61.0	29.926						17	19 45	+ 6.44
4 21.76	59.0	61.0	29.926						18	18 00	

Notes.
 Clock time decreased 2^m. Circle reading assumed 210°.
 Two micrometer readings increased 0.5 each.
 One level reading increased 0.5 div.
 One level reading increased 1.5 div.

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903 C.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	
9 12 45	61.0	...	...		1	216 2 39.28	+17.77
12 59	60.1	...	...		2	37.96	+11.75
13 7	...	62.5	30.010		3	38.04	+12.01
13 22	59.1	...	...		4	39.66	- 2.86
13 45	58.4	...	...		5	38.62	+ 8.23
13 42	...	61.5	30.014		6	38.20	+11.00
10 10 55	65.3	68.5	30.032		7	38.38	
11 11	64.1	...	...		8	38.50	
11 19	...	65.0	30.046		9	37.82	+ 9.31
11 28	63.7	...	...		10	39.42	+12.82
11 40	62.5	...	...		11	37.02	
11 51	62.5	...	...		12	38.78	
11 57	...	64.0	30.054		13	38.61	
12 5	61.9	...	...		14	37.92	+ 0.31
12 18	61.6	...	...		15	39.14	- 2.15
12 32	60.4	62.5	30.058		16	40.17	
12 43	60.3	...	...		17	40.80	+10.10
12 56	59.8	...	...		18	40.12	...
13 3	...	61.5	30.052	4 W. 2 E			
11 10 10	...	67.0	30.082	One microscope reading decreased 10".			
10 17	64.4	...	...	Poor.			
10 55	63.6	...	...		
11 4	...	64.8	30.078				
11 11	63.1	...	...		
11 22	62.2	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	7 Cephei s. p.	E	4	11 32 10.0	3 18.2	46.30	48.75	.....	152 5 15.72	+ 1.34	- 4.14	-1 55.87	+77 5 20.63
		W	...	11 41 10.0	5 41.8	46.85	48.95	.....	279 59 52.35	+ 1.54	+12.30	+1 55.87	
2	Groombridge 4103 s. p.	W	4	11 47 0.0	3 18.6	46.75	48.80	.....	283 12 56.85	+ 1.55	+ 5.05	+2 14.44	+73 52 6.89
		E	...	11 52 40.0	2 21.4	45.45	48.20	.....	148 52 21.48	+ 0.93	- 2.56	-2 14.43	
3	128 H ¹ . Camelop.	E	2	11 57 42.0	2 26.1	46.05	48.60	.....	168 51 20.88	+ 1.17	+ 0.83	-1 1.42	+86 7 35.63
		W	...	12 2 33.0	2 24.9	47.55	49.70	.....	263 13 56.28	+ 2.11	- 0.82	+1 1.42	
4	p Virginis	W	3	12 34 14.0	2 58.5	46.50	48.80	.....	187 53 26.82	+ 1.41	+28.15	- 30.57	+10 46 2.77
		E	...	12 39 10.0	2 3.5	44.95	47.35	.....	244 11 36.70	+ 0.21	-13.48	+ 30.57	
5	p Centauri	E	3	12 42 42.0	2 58.0	45.20	47.80	.....	288 23 41.08	+ 0.50	-11.77	+2 57.70	-33 28 30.89
		W	...	12 47 44.0	2 4.0	47.80	49.20	.....	143 41 42.00	+ 1.98	+ 5.71	-2 57.70	
6	43 H. Cephei s. p.	W	3	12 52 20.0	3 3.7	47.25	49.05	.....	271 21 50.58	+ 1.71	+ 1.29	+1 22.54	+85 44 6.84
		E	...	12 58 5.0	2 32.3	44.50	46.85	.....	100 43 27.12	- 0.15	- 0.89	-1 22.54	
7	Groombridge 2006	E	2	13 3 0.0	1 27.8	45.00	47.55	.....	166 48 41.15	+ 0.44	+ 0.14	-1 6.37	+88 10 21.15
		W	...	13 8 40.0	4 12.2	48.05	49.40	.....	265 16 36.40	+ 2.27	- 1.14	+1 6.39	
8	d May 12, E. Leonis	W	3	10 52 47.0	2 50.1	44.95	47.95	.....	181 15 43.88	- 0.03	+23.80	- 39.36	+ 4 8 5.11
		E	...	10 57 54.0	2 7.9	44.55	47.80	.....	250 49 24.70	- 0.12	-12.14	+ 39.36	
9	π Cephei s. p.	E	3	11 2 5.0	2 56.0	45.45	48.40	.....	149 51 46.78	+ 0.33	- 3.75	-2 7.73	+74 51 39.45
		W	...	11 7 8.0	2 7.0	45.95	48.50	.....	282 13 32.68	+ 0.60	+ 1.95	+2 7.75	
10	83 Leonis	W	2	11 18 31.0	3 32.9	45.00	48.10	.....	180 39 46.08	+ 0.05	+33.15	- 40.33	+ 3 32 16.09
		E	...	11 24 36.0	2 32.1	44.95	47.85	.....	251 25 17.05	+ 0.06	-16.92	+ 40.32	
11	o Hydræ	E	4	11 32 55.0	2 42.4	45.45	48.70	.....	289 7 47.42	+ 0.47	- 9.67	+3 4.64	-34 12 47.63
		W	...	11 37 53.0	2 15.6	46.70	49.35	.....	142 57 30.50	+ 1.25	+ 6.74	-3 4.64	
12	298 G. Hydræ	W	3	11 41 42.0	2 22.7	46.30	48.85	.....	150 56 17.00	+ 1.27	+ 8.54	-2 1.82	-26 12 57.53
		E	...	11 45 40.0	1 35.3	45.80	48.45	.....	281 8 55.05	+ 0.72	- 3.81	+2 1.82	
13	b Virginis	E	3	11 52 10.0	3 2.2	45.75	48.35	.....	250 46 10.30	+ 0.89	-24.67	+ 39.42	+ 4 11 30.69
		W	...	11 57 25.0	2 12.8	46.40	48.85	.....	181 19 18.92	+ 0.98	+13.10	- 39.41	
14	10 Virginis	W	3	12 1 54.0	3 2.5	45.65	48.50	.....	179 34 1.62	+ 0.99	+23.74	- 42.04	+ 2 26 21.05
		E	...	12 7 3.0	2 6.5	45.60	48.45	.....	252 31 4.72	+ 0.62	-11.41	+ 42.03	
15	5 B. Ursæ Minoris	E	3	12 11 22.0	2 56.5	46.80	48.90	.....	168 0 23.42	+ 1.42	+ 0.94	-1 3.25	+86 58 35.15
		W	...	12 16 26.0	2 7.5	46.05	48.70	.....	264 4 55.40	+ 0.92	- 0.49	+1 3.25	
16	20 Comæ Berenices	W	3	12 21 36.0	3 28.1	45.50	48.50	.....	198 32 36.32	+ 0.75	+56.90	- 17.97	+21 25 52.65
		E	...	12 27 43.0	2 38.9	45.70	48.20	.....	233 32 18.88	+ 0.76	-33.18	+ 17.97	
17	330 G. Hydræ	E	3	12 36 7.0	2 57.2	46.40	48.95	.....	282 43 43.75	+ 0.90	-12.84	+2 11.49	-27 47 47.03
		W	...	12 41 22.0	2 17.8	47.40	49.20	.....	149 21 37.88	+ 1.35	+ 7.76	-2 11.48	
18	32 ¹ H. Camelop.	W	3	12 45 50.0	2 49.6	46.30	48.85	.....	261 2 56.75	+ 1.07	- 1.82	+ 57.03	+83 56 29.85
		E	...	12 50 32.0	1 52.4	46.00	48.35	.....	171 2 22.40	+ 0.90	+ 0.80	- 57.03	
19	48 Virginis	E	3	12 55 52.0	1 16.2	47.10	48.90	.....	258 0 9.35	+ 1.58	-24.34	+ 51.50	- 3 8 41.53
		W	...	13 1 33.0	2 24.8	47.80	49.35	.....	173 59 17.85	+ 1.60	+13.26	- 51.48	

Time	Ther 1902	Alt ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>mm</i>				
11 31 10		61.4	30.004		1	116 2 19.56	
11 31 11	61.5				2	41.66	
11 31 12	61.3				3	40.72	- 6.93
11 31 13	61.1				4	19.90	
11 31 14		61.4	30.004		5	49.75	+ 17.90
11 31 15	61.9				6	19.83	
11 31 16	61.6				7	19.64	- 6.09
11 31 17	61.2				8	40.04	
11 31 18	61.0				9	39.40	
11 31 19	61.0		30.119		10	39.14	
11 31 20	61.0		30.111		11	38.35	+ 24.25
11 31 21	61.5				12	39.48	+ 24.06
11 31 22			30.119		13	39.75	+ 12.39
11 31 23	61.6				14	40.14	+ 12.71
11 31 24	61.7		30.113		15	40.80	+ 7.07
11 31 25	61.9				16	46.72	
11 31 26	61.4				17	39.40	+ 11.77
11 31 27	61.0				18	46.86	
11 31 28	61.0				19	39.69	+ 11.04
11 31 29	61.6	61.0	30.130				
11 31 30	61.8						
11 31 31	61.1						
11 31 32	61.1						
11 31 33	61.1						
11 31 34	61.0						
11 31 35	61.0						
11 31 36	61.0						
11 31 37	61.0						
11 31 38	61.0						
11 31 39	61.0						
11 31 40	61.0						
11 31 41	61.0						
11 31 42	61.0						
11 31 43	61.0						
11 31 44	61.0						
11 31 45	61.0						
11 31 46	61.0						
11 31 47	61.0						
11 31 48	61.0						
11 31 49	61.0						
11 31 50	61.0						
11 31 51	61.0						
11 31 52	61.0						
11 31 53	61.0						
11 31 54	61.0						
11 31 55	61.0						
11 31 56	61.0						
11 31 57	61.0						
11 31 58	61.0						
11 31 59	61.0						
11 32 00	61.0						
11 32 01	61.0						
11 32 02	61.0						
11 32 03	61.0						
11 32 04	61.0						
11 32 05	61.0						
11 32 06	61.0						
11 32 07	61.0						
11 32 08	61.0						
11 32 09	61.0						
11 32 10	61.0						
11 32 11	61.0						
11 32 12	61.0						
11 32 13	61.0						
11 32 14	61.0						
11 32 15	61.0						
11 32 16	61.0						
11 32 17	61.0						
11 32 18	61.0						
11 32 19	61.0						
11 32 20	61.0						
11 32 21	61.0						
11 32 22	61.0						
11 32 23	61.0						
11 32 24	61.0						
11 32 25	61.0						
11 32 26	61.0						
11 32 27	61.0						
11 32 28	61.0						
11 32 29	61.0						
11 32 30	61.0						
11 32 31	61.0						
11 32 32	61.0						
11 32 33	61.0						
11 32 34	61.0						
11 32 35	61.0						
11 32 36	61.0						
11 32 37	61.0						
11 32 38	61.0						
11 32 39	61.0						
11 32 40	61.0						
11 32 41	61.0						
11 32 42	61.0						
11 32 43	61.0						
11 32 44	61.0						
11 32 45	61.0						
11 32 46	61.0						
11 32 47	61.0						
11 32 48	61.0						
11 32 49	61.0						
11 32 50	61.0						
11 32 51	61.0						
11 32 52	61.0						
11 32 53	61.0						
11 32 54	61.0						
11 32 55	61.0						
11 32 56	61.0						
11 32 57	61.0						
11 32 58	61.0						
11 32 59	61.0						
11 33 00	61.0						

Note.
1 E. One microscope reading decreased 10.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	May 12, H. Ophiuchi (<i>s. star</i>)	E	...	16 16 46.0	3 14.3	47.30	48.85	.....	278 9 48.18	+ 2.23	-16.65	+1 48.37	-23 13 24.03
		W	...	16 22 49.0	2 48.7	48.65	49.50	.....	153 55 33.15	+ 2.98	+12.55	-1 48.36	
2	24 Scorpii	W	...	16 32 56.0	3 15.9	46.25	48.30	.....	159 35 17.88	+ 1.68	+18.62	-1 26.72	-17 33 12.63
		E	...	16 38 52.0	2 40.1	44.90	47.60	.....	272 29 55.30	+ 0.88	-12.44	+1 26.71	
3	<i>ε</i> Ophiuchi	E	...	16 47 26.0	2 12.8	46.70	48.95	.....	244 38 8.75	+ 2.23	-15.38	+ 31.41	+10 19 29.99
		W	...	16 52 23.0	2 44.2	49.10	49.90	.....	187 26 57.78	+ 3.35	+23.52	- 31.41	
4	<i>A</i> Ophiuchi (<i>s. star</i>)	W	...	17 6 27.0	3 10.1	46.50	48.45	.....	150 41 40.95	+ 1.81	+15.10	-2 5.09	-26 27 31.83
		E	...	17 12 26.0	2 48.9	44.05	47.80	.....	281 23 36.28	+ 0.73	-11.92	+2 5.08	
5	May 13, E. <i>χ</i> Hydræ	E	3	10 57 26.0	3 26.7	47.65	49.95	.....	281 42 42.68	+ 1.49	-17.76	+2 3.18	-26 46 34.23
		W	...	11 3 31.0	2 38.3	46.30	49.20	.....	150 22 39.40	+ 0.74	+10.42	-2 3.17	
6	<i>φ</i> Leonis	W	3	11 8 25.0	3 32.0	46.05	48.90	.....	174 0 12.80	+ 0.64	+28.44	- 50.53	- 3 7 31.65
		E	...	11 14 37.0	2 40.0	46.40	49.30	.....	258 4 53.32	+ 0.74	-16.20	+ 50.53	
7	<i>e</i> Leonis	E	3	11 22 34.0	3 0.8	46.40	49.00	.....	257 25 47.02	+ 0.31	-20.96	+ 49.43	- 2 28 20.70
		W	...	11 27 39.0	2 4.2	47.50	50.00	.....	174 39 39.02	+ 1.18	+ 9.89	- 49.43	
8	<i>γ</i> Cephei s. p.	W	3	11 32 44.0	2 49.8	46.90	49.60	.....	280 0 5.78	+ 1.29	+ 3.04	+1 54.36	+77 5 18.69
		E	...	11 37 42.0	2 8.2	46.70	49.05	.....	152 5 11.05	+ 0.62	- 1.73	-1 54.36	
9	298 G. Hydræ	E	2	11 41 46.0	2 18.7	46.75	49.20	.....	281 8 58.88	+ 0.77	- 8.07	+2 0.47	-26 12 56.89
		W	...	11 46 24.0	2 19.3	46.95	49.35	.....	150 56 15.75	+ 1.12	+ 8.14	-2 0.47	
10	318 B. Cephei s. p.	W	3	12 7 58.0	2 56.9	46.80	49.85	.....	280 40 42.80	+ 1.17	+ 3.45	+1 58.18	+76 24 35.99
		E	...	12 12 58.0	2 3.1	45.85	48.35	.....	151 24 30.95	+ 0.22	- 1.67	-1 58.18	
11	14 Comæ Berenices	E	3	12 18 54.0	2 52.3	45.75	48.20	.....	227 10 28.95	+ 0.13	-57.74	+ 11.10	+27 48 14.36
		W	...	12 23 48.0	2 1.7	47.30	49.90	.....	204 55 18.50	+ 1.17	+28.83	- 11.08	
12	319 B. Cephei s. p.	W	3	12 29 35.0	3 1.3	47.10	49.70	.....	275 8 23.10	+ 1.30	+ 2.28	+1 33.94	+81 57 21.17
		E	...	12 35 0.0	2 23.7	45.65	48.10	.....	156 56 52.15	- 0.07	- 1.43	-1 33.94	
13	35 Virginis	E	3	12 40 2.0	3 6.6	46.10	48.45	.....	250 51 44.80	- 0.03	-25.81	+ 39.24	+ 4 5 57.35
		W	...	12 45 32.0	2 23.4	46.65	49.10	.....	181 13 42.70	+ 0.46	+15.24	- 39.24	
14	48 Virginis	W	3	12 55 51.0	3 17.2	46.05	48.45	.....	173 59 7.48	+ 0.15	+24.59	- 50.94	- 3 8 40.81
		E	...	13 1 31.0	2 22.8	45.30	48.15	.....	258 5 59.10	- 0.50	-12.90	+ 50.93	
15	<i>r</i> Centauri	E	3	13 8 23.0	3 21.0	45.80	48.25	.....	285 55 27.62	- 0.14	-15.65	+2 33.00	-30 59 50.30
		W	...	13 14 43.0	2 59.0	46.80	48.80	.....	146 9 50.75	+ 0.33	+12.41	-2 33.00	
16	70 Virginis	W	4	13 20 55.0	2 59.7	45.90	48.60	.....	191 24 56.92	+ 0.23	+31.86	- 25.92	+14 17 41.18
		E	...	13 25 57.0	2 2.3	45.60	48.50	.....	240 40 2.95	+ 0.36	-14.76	+ 25.92	
17	May 15, H. 83 Leonis	E	...	11 18 52.0	3 12.1	48.40	49.95	.....	251 25 23.80	+ 1.97	-27.00	+ 39.27	+ 3 32 20.02
		W	...	11 24 51.0	2 46.9	46.90	49.80	.....	180 40 1.52	+ 1.70	+20.38	- 39.26	
18	<i>γ</i> Cephei s. p.	W	...	11 32 20.0	3 14.3	46.10	49.70	.....	280 0 5.52	+ 1.39	+ 3.98	+1 52.81	+77 5 20.13
		E	...	11 37 27.0	1 52.7	46.55	49.65	.....	152 5 10.55	+ 1.29	- 1.34	-1 52.79	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
12 16 11	...	59.0	30.112		1	216 2 41.22	- 1.58
16 20	56.3	...	...		2	40.96	- 2.20
16 36	55.6	...	...		3	40.12	- 0.03
16 50	55.5	57.5	30.102		4	41.47	...
17 9	54.9	...	...		5	38.49	+ 23.44
17 16	...	67.0	30.100		6	39.87	+ 16.27
13 10 54	...	70.5	30.000		7	38.23	+ 15.58
11 0	68.0	...	...		8	40.02	...
11 12	67.3	...	...		9	38.30	+ 21.12
11 25	66.9	69.2	29.998		10	38.46	+ 8.24
11 35	66.7	...	...		11	39.93	+ 5.06
11 44	66.2	...	...		12	38.66	+ 7.77
11 50	...	67.8	29.992		13	38.68	...
12 10	65.2	...	...		14	38.96	+ 11.61
12 21	64.5	66.9	29.990		15	37.66	+ 15.09
12 32	64.3	...	...		16	38.78	...
12 44	63.7	...	...		17	41.19	...
12 50	...	65.8	29.988		18	40.70	...
12 59	63.4	...	...		
13 12	63.1	...	...		
13 23	62.9	...	...		
13 29	...	64.7	29.978				
15 11 8	...	74.5	29.818				
11 22	70.8	...	...		
11 35	70.0	73.0	29.786				

Notes.
4 W. One microscope reading increased 10".
10 W. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	b Virginis	E W		11 51 57.0 11 57 57.0	3 15.4 2 44.6	48.35 47.15	51.25 49.70		250 46 11.15 181 10 10.88	+ 2.81 + 1.51	- 28.37 + 20.13	+ 38.42 - 38.41	+ 4 11 31.92
2	r Canum Venat.	W E		12 6 52.0 12 12 50.0	3 16.6 2 47.4	45.50 45.95	48.85 49.70		231 6 13.88 200 50 12.52	+ 0.78 + 1.12	- 37.12 + 20.92	+ 14.94 - 14.93	+ 53 58 30.29
3	20 Comæ Berenices	E W		12 21 50.0 12 27 49.0	3 14.5 2 44.5	48.60 47.40	50.75 49.15		233 32 32.78 108 32 55.42	+ 2.58 + 1.37	- 49.70 + 35.50	+ 17.51 - 17.50	+ 21 25 52.71
4	p Virginis	W E		12 34 4.0 12 39 51.0	3 8.2 2 38.8	44.80 46.55	48.00 49.05		187 53 24.10 244 11 44.25	- 0.08 + 1.18	+ 31.29 - 22.27	- 20.72 + 20.72	+ 10 46 3.23
5	May 17, H. 39 H. Cephei S.P.	E W		11 24 47.0 11 30 48.0	3 13.4 2 47.6	47.35 47.15	46.50 46.60		101 45 27.35 270 10 49.10	+ 1.44 + 1.30	- 1.10 + 0.83	- 17.62 + 17.04	+ 86 46 13.70
6	ζ Crateris	W E		11 36 50.0 11 42 48.0	3 14.8 2 43.2	46.25 46.15	45.80 46.30		150 10 29.30 272 45 43.58	+ 0.76 + 0.94	+ 18.33 - 12.87	- 17.09 + 17.09	- 17 48 59.85
7	o Leonis	E W		11 48 9.0 11 53 0.0	2 46.1 2 4.9	46.75 47.55	46.55 46.40		238 46 56.95 193 18 32.25	+ 1.37 + 1.03	- 29.09 + 16.45	+ 23.48 - 23.48	+ 16 11 3.94
8	1 Canum Venat.	W E		12 6 52.0 12 12 55.0	3 16.9 2 46.1	45.05 44.95	45.05 45.55		231 6 14.45 200 50 13.80	+ 0.25 + 0.28	- 37.23 + 26.51	+ 15.11 - 15.10	+ 53 58 30.41
9	14 Comæ Berenices	E W		12 18 36.0 12 24 30.0	3 10.9 2 43.1	46.75 47.15	46.05 46.30		227 10 40.65 204 54 56.58	+ 1.18 + 1.38	- 10.86 + 51.75	+ 11.05 - 11.04	+ 27 48 15.19
10	p Virginis	W E		12 33 53.0 12 39 50.0	3 10.5 2 40.5	44.80 45.15	45.15 45.30		187 53 22.08 244 11 46.72	+ 0.02 + 0.13	+ 35.16 - 24.50	- 30.08 + 30.07	+ 10 46 4.25
11	ψ Virginis	E W		12 46 11.0 12 52 19.0	3 21.7 2 46.3	45.45 46.75	45.65 46.15		263 58 13.05 168 7 11.58	+ 0.66 + 1.14	- 22.96 + 15.61	+ 1.24 - 1.24	- 9 0 56.58
12	σ Virginis	W E		13 0 43.0 13 15 40.0	3 13.6 2 43.4	44.80 45.00	44.60 45.00		183 6 13.88 248 58 57.75	+ 0.10 + 0.08	+ 20.09 - 20.72	+ 36.40 - 36.40	+ 5 58 43.36
13	70 Virginis	E W		13 10 43.0 13 25 41.0	4 12.3 1 45.7	45.35 46.50	45.65 45.85		240 40 52.98 191 25 18.28	+ 0.53 + 0.89	- 1.81 + 11.02	+ 25.86 - 25.84	+ 14 17 40.77
14	May 19, E. φ Leonis	E W	3	11 10 15.0 11 14 18.0	1 43.2 2 19.8	49.30 46.95	48.15 46.50		258 4 42.92 174 0 26.62	+ 4.29 + 2.82	+ 6.74 + 12.37	+ 49.20 - 49.20	- 3 7 31.66
15	e Leonis	W E	3	11 23 3.0 11 28 0.0	2 33.0 2 24.0	45.75 46.05	45.40 46.55		174 39 34.20 257 25 41.25	+ 1.60 + 2.31	+ 15.01 + 13.20	- 48.08 + 48.08	- 2 28 20.89
16	1 Virginis	E W	4	11 38 30.0 11 43 49.0	2 36.9 2 42.1	47.00 46.30	47.00 46.90		247 53 28.52 184 11 44.40	+ 2.86 + 2.54	- 10.64 + 20.97	+ 33.95 - 33.95	+ 7 4 11.01
17	128 H ¹ . Camelop.	W E	3	11 57 50.0 12 3 41.0	2 16.9 3 34.1	42.90 44.15	43.85 44.90		263 14 2.68 168 51 16.25	+ 0.37 + 1.02	- 0.78 + 1.79	+ 58.92 - 58.92	+ 86 7 37.42
18	6 B. Ursæ Minoris	E W	3	12 11 41.0 12 17 37.0	2 59.6 2 56.4	44.65 44.25	45.35 44.40		166 44 36.42 265 20 42.98	+ 1.51 + 0.91	+ 0.55 + 0.53	- 3.64 + 3.64	+ 88 14 22.95

Time	Ther. alt.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to
<i>h m s</i>			<i>in</i>							<i>0.000</i>
11 17 55	69.0		29.995					1	216 2 19.06	+ 17.42
12 11	68.4		29.995					2	19.06	- 1.91
12 24		21.5	29.995					3	19.01	
12 24	68.1		29.995					4	19.74	
12 27	67.0		29.995					5	19.50	
12 29		20.5	29.995					6	19.02	
12 30 20		20.0	29.995					7	19.78	+ 8.72
12 28	68.2		29.995					8	19.04	+ 2.26
12 29	68.0		29.995					9	19.14	+ 4.51
12 31	67.8		29.995					10	19.50	
12 32	67.5	69.5	29.995					11	19.54	+ 11.09
12 33	67.9		29.995					12	19.09	+ 8.68
12 32	67.9		29.995					13	19.40	
12 33	67.0	69.0	29.995					14	41.14	+ 13.99
12 37	67.0		29.995					15	40.68	+ 13.34
12 40	67.7		29.995					16	19.82	+ 11.70
12 5	68.0		29.995					17	40.69	- 2.10
12 11	64.9		29.995					18	40.92	
12 21	64.4		29.995							
12 31	67.0		29.995							
12 32	67.4	78.8	29.995							
12 31	67.1	78.8	29.995							
12 33	67.2		29.995							

Notes:
 1 W. Clock time decreased 10"
 11 Hazy
 16 E. One level reading decreased 0.01

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
May 21, H.													
1	6 B. Libræ	W	...	<i>h m s</i> 14 28 53.0	<i>m s</i> 3 11.7	<i>d</i> 58.00	<i>d</i> 50.80	<i>r</i>	<i>s ' ' "</i> 165 14 29.30	<i>" "</i> + 2.51	<i>" "</i> + 19.69	<i>" "</i> - 1 7.47	<i>° ' "</i> - 11 53 41.02
		E	...	14 34 53.0	2 48.3	55.05	49.55	.....	266 50 46.35	+ 1.16	- 15.17	+ 1 7.47	
2	ε Boötis	E	...	14 43 51.0	3 18.2	49.30	51.15	.....	235 28 12.10	+ 2.51	- 47.24	+ 19.45	+ 19 30 10.35
		W	...	14 49 50.0	2 49.8	51.35	51.80	.....	196 37 15.18	+ 3.39	+ 34.67	- 19.45	
3	ε Boötis	W	...	15 0 3.0	3 13.6	49.50	51.30	.....	202 21 22.42	+ 2.57	+ 0.80	- 13.44	+ 25 14 47.65
		E	...	15 5 50.0	2 39.4	48.05	50.50	.....	229 43 36.85	+ 1.72	- 41.23	+ 13.44	
4	α ² Libræ	E	...	15 14 41.0	3 10.8	48.60	50.65	.....	269 44 19.02	+ 2.04	- 18.53	+ 1 15.01	- 14 47 20.14
		W	...	15 20 35.0	2 43.2	51.45	51.85	.....	162 21 1.52	+ 3.45	+ 13.50	- 1 15.01	
5	3 H. Scorpii	W	...	15 28 9.0	3 14.1	50.40	51.50	.....	149 20 21.52	+ 3.01	+ 15.39	- 2 7.47	- 27 48 52.75
		E	...	15 34 11.0	2 47.9	47.05	49.90	.....	282 44 54.58	+ 1.16	- 11.52	+ 2 7.46	
6	γ Lupi	E	...	15 41 38.0	3 24.8	47.80	50.05	.....	288 15 19.28	+ 1.44	- 15.61	+ 2 50.25	- 33 19 56.75
		W	...	15 47 48.0	2 45.2	51.70	52.00	.....	143 50 4.48	+ 3.68	+ 10.16	- 2 50.21	
7	τ Herculis	W	...	15 53 49.0	3 18.0	50.05	51.20	.....	195 12 9.48	+ 2.77	+ 44.45	- 21.03	+ 18 5 11.17
		E	...	15 59 49.0	2 42.0	47.15	49.85	.....	236 52 54.65	+ 1.17	- 29.76	+ 21.02	
8	19 Ursæ Minoris	E	...	16 10 39.0	3 11.4	48.15	50.05	.....	178 51 11.68	+ 1.56	+ 6.17	- 41.92	+ 76 7 21.75
		W	...	16 16 35.0	2 44.6	52.60	52.70	.....	253 14 5.62	+ 4.27	- 4.56	+ 41.93	
9	42 Herculis	W	...	16 33 8.0	3 13.3	52.30	51.70	.....	226 15 14.32	+ 3.64	- 58.55	+ 9.98	+ 49 7 5.08
		E	...	16 38 58.0	2 36.7	46.35	48.80	.....	205 50 23.98	+ 0.45	+ 38.51	- 9.97	
May 22, E.													
10	ν Virginis	E	3	11 37 58.0	3 8.5	52.10	52.70	.....	247 53 36.25	+ 0.52	- 28.36	+ 33.77	+ 7 4 12.03
		W	...	11 44 5.0	2 58.5	50.90	51.50	.....	184 11 41.28	- 0.44	+ 25.43	- 33.77	
May 28, E.													
11	10 Virginis	E	3	12 1 48.0	3 6.1	55.65	52.75	.....	252 31 6.28	+ 3.98	- 24.69	+ 41.38	+ 2 26 22.74
		W	...	12 8 5.0	3 10.9	51.40	50.15	.....	179 33 52.68	+ 1.40	+ 25.98	- 41.38	
12	c Virginis	W	3	12 12 34.0	3 2.5	50.15	49.60	.....	180 58 29.38	+ 0.78	+ 24.54	- 39.30	+ 3 50 59.06
		E	...	12 18 31.0	2 54.5	54.45	52.25	.....	251 6 30.78	+ 3.39	- 22.44	+ 39.30	
13	f Virginis	E	3	12 29 28.0	2 30.8	55.15	52.60	.....	260 15 8.02	+ 3.76	- 13.78	+ 54.54	- 5 18 3.78
		W	...	12 34 27.0	2 28.2	51.25	50.00	.....	171 49 51.18	+ 1.28	+ 13.31	- 54.54	
14	Groombridge 1922	W	3	12 38 12.0	2 33.3	49.70	49.20	.....	223 6 22.62	+ 0.45	- 56.41	+ 6.96	+ 45 58 18.66
		E	...	12 43 19.0	2 33.7	52.85	51.20	.....	208 58 37.92	+ 2.39	+ 56.71	- 6.96	
15	43 H. Cephei s. p.	E	4	12 53 45.0	1 48.9	53.70	51.80	.....	160 43 14.05	+ 2.92	- 0.46	- 1 20.97	+ 85 44 4.26
		W	...	12 59 41.0	4 7.1	50.90	49.80	.....	271 21 48.88	+ 1.08	+ 2.34	+ 1 20.97	
16	61 Virginis	W	3	13 10 50.0	2 41.4	49.75	49.45	.....	159 21 57.68	+ 0.55	+ 12.59	- 1 25.43	- 17 46 32.16
		E	...	13 16 43.0	3 11.6	53.50	52.05	.....	272 43 12.80	+ 2.98	- 17.75	+ 1 25.44	
May 28, H.													
17	c ¹ Centauri	E	...	14 34 43.0	3 12.8	51.75	49.40	.....	289 40 22.45	+ 2.91	- 13.50	+ 3 9.76	- 34 45 30.32
		W	...	14 40 47.0	2 51.2	49.05	47.35	.....	142 24 45.25	+ 1.06	+ 10.65	- 3 9.74	

Time	Ther. shad	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
d h m	s	s	in.				
21 14 24		76.5	29.808		1	216 2 41.92	+ 7.07
14 32	72.8				2	40.30	+ 2.07
14 47	72.4				3	41.56	+ 0.94
14 57		75.0	29.798		4	40.53	
15 3	72.0				5	42.06	+ 3.18
15 18	71.6				6	41.74	+ 1.84
15 31	71.5				7	41.38	+ 0.24
15 38		74.5	29.788		8	42.18	
15 45	71.3				9	41.18	- 0.90
15 57	71.4				10	37.44	+ 11.37
16 0		74.0	29.780		11	32.82	+ 11.60
16 14	70.9				12	33.22	+ 11.49
16 36	69.8				13	31.88	
16 49		72.0	29.774		14	31.84	- 2.50
22 01 14		82.4	29.775		15	34.40	
01 47	79.4				16	34.41	
01 56		81.2	29.792		17	34.42	+ 9.47
01 59		79.0	29.916				
02 5	66.7			Notes.			
02 16	66.6			9 Clouds.			
02 24		69.5	29.921	10. Hazy, clouds.			
02 32	65.8			11. Hazy.			
02 41	65.6			12 E. One level reading increased < div			
02 52	65.8						
03 14	64.4						
03 26		66.7	29.944				
03 29		66.6	29.944				
03 37	65.9						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	381 G. Centauri	W	...	14 47 19.0	2 40.9	47.20	46.60	.....	143 42 12.00	+ 0.17	+ 9.61	-2 55.39	-33 27 51.86
		E	...	14 53 22.0	3 22.1	48.80	47.55	.....	288 23 2.58	+ 1.05	-15.17	+2 55.40	
2	57 B. Ursæ Minoris	E	...	15 5 20.0	3 18.7	50.15	48.75	.....	167 22 23.25	+ 2.11	+ 0.93	-1 4.16	+87 36 29.20
		W	...	15 11 17.0	2 38.3	48.35	47.65	.....	264 42 42.22	+ 0.99	- 0.59	+1 4.15	
3	32 Libræ	W	...	15 19 45.0	3 14.2	47.40	46.90	.....	160 45 34.68	+ 0.27	+18.68	-1 21.45	-16 22 44.58
		E	...	15 25 47.0	2 47.8	47.50	47.30	.....	271 19 27.08	+ 0.50	-13.94	+1 21.45	
4	149 H ¹ . Cephei s. p.	E	...	15 31 40.0	3 16.8	48.90	47.80	.....	161 19 34.78	+ 1.17	- 1.29	-1 19.69	+86 20 24.54
		W	...	15 37 40.0	2 43.2	47.30	47.10	.....	270 45 31.22	+ 0.33	+ 0.88	+1 19.69	
5	π Scorpii	W	...	15 49 56.0	3 15.3	47.30	46.55	.....	151 18 51.68	+ 0.13	+16.11	-1 59.03	-25 50 6.58
		E	...	15 56 4.0	2 52.7	48.05	47.15	.....	280 46 8.68	+ 0.71	-12.60	+1 59.02	
6	151 H ¹ . Cephei s. p.	E	...	16 2 58.0	3 5.1	49.10	47.50	.....	160 17 5.05	+ 1.12	- 1.44	-1 22.87	+85 17 51.19
	June 2, E.	W	...	16 8 57.0	2 53.9	48.05	46.65	.....	271 48 1.10	+ 0.48	+ 1.27	+1 22.87	
7	ρ Virginis	E	3	12 34 6.0	3 0.7	54.05	49.35	.....	244 11 38.62	+ 5.76	-28.85	+ 30.22	+10 46 5.57
		W	...	12 39 59.0	2 52.3	46.65	44.45	.....	187 53 25.92	+ 1.19	+26.23	- 30.21	
8	32 ² H. Camelop.	W	3	12 45 33.0	2 58.3	45.25	43.80	.....	261 2 57.38	+ 0.59	- 2.01	+ 56.50	+83 56 33.26
		E	...	12 51 30.0	2 58.7	52.90	48.35	.....	171 2 8.78	+ 5.39	+ 2.02	- 56.50	
9	48 Virginis	E	3	12 56 47.0	2 15.9	53.25	49.05	.....	258 5 46.75	+ 5.33	-11.68	+ 51.03	- 3 8 39.68
		W	...	13 1 18.0	2 15.1	47.40	44.75	.....	173 59 16.18	+ 1.61	+11.54	- 51.03	
10	σ Virginis	W	4	13 9 50.0	3 0.8	46.15	44.25	.....	183 6 14.45	+ 1.31	+25.37	- 36.80	+ 5 58 45.11
		E	...	13 15 41.0	2 50.2	52.70	48.45	.....	248 58 48.38	+ 5.17	-22.48	+ 36.80	
11	α Ursæ Minoris s. p.	E	4	13 21 15.0	2 41.6	52.50	48.10	.....	113 46 13.50	+ 5.12	- 0.30	-1 13.32	+88 47 12.91
		W	...	13 26 39.0	2 42.4	46.65	44.35	.....	268 18 50.48	+ 1.32	+ 0.30	+1 13.32	
12	13 B. Ursæ Minoris	W	3	13 32 0.0	2 59.2	46.60	44.25	.....	248 51 4.90	+ 1.19	- 7.87	+ 36.63	+71 44 16.94
		E	...	13 38 13.0	3 13.8	51.10	47.10	.....	183 13 58.52	+ 3.67	+ 9.20	- 36.66	
13	h Centauri	E	4	13 44 36.0	3 10.7	51.65	47.85	.....	286 22 32.10	+ 4.65	-13.97	+2 37.71	-31 27 8.39
		W	...	13 50 47.0	3 0.3	47.95	45.30	.....	145 42 32.90	+ 2.27	+12.49	-2 37.71	
14	94 Virginis	W	3	13 58 49.0	2 29.3	46.60	44.35	.....	168 42 14.98	+ 1.48	+12.72	-1 1.67	- 8 25 51.81
		E	...	14 3 42.0	2 23.7	51.40	47.70	.....	263 22 50.60	+ 4.40	-11.78	+1 1.67	
15	4 Ursæ Minoris	E	3	14 7 10.0	2 11.6	52.30	48.40	.....	176 58 9.52	+ 5.23	+ 2.42	- 46.10	+78 0 21.33
		W	...	14 11 40.0	2 18.4	47.70	45.15	.....	255 6 54.55	+ 2.00	- 2.68	+ 46.10	
16	g Boötis	W	3	14 22 43.0	2 40.8	46.30	44.20	.....	227 24 31.85	+ 1.24	-35.59	+ 11.43	+50 16 49.98
		E	...	14 28 13.0	2 49.2	50.90	47.30	.....	204 40 30.62	+ 4.15	+39.40	- 11.43	
17	34 Boötis	E	3	14 36 43.0	2 35.1	52.00	47.85	.....	228 1 55.65	+ 4.32	-43.82	+ 12.09	+26 56 24.38
		W	...	14 41 55.0	2 36.9	47.50	44.70	.....	204 3 8.85	+ 1.65	+44.84	- 12.09	
18	381 G. Centauri	W	3	14 47 34.0	2 23.0	46.30	43.90	.....	143 42 15.60	+ 1.18	+ 7.59	-2 57.01	-33 27 51.54
	June 3, E.	E	...	14 52 52.0	2 55.0	50.60	46.95	.....	288 22 54.78	+ 3.77	-11.37	+2 57.03	
19	15 Comæ Berenices	E	4	12 19 47.0	2 26.5	54.30	50.40	.....	226 9 55.30	+ 5.16	-45.42	+ 9.96	+28 48 25.35
		W	...	12 24 12.0	1 58.5	48.45	46.10	.....	205 55 20.75	+ 1.42	+29.73	- 9.96	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
28 14 50	62.9	...	...								1	216 2 35.12	+ 8.11
14 58	...	64.7	29.938								2	34.45	...
15 8	62.6	...	...								3	33.64	...
15 23	62.0	...	...								4	33.54	+ 7.39
15 35	62.4	...	...								5	32.35	+ 1.35
15 43	...	64.5	29.935								6	33.79	...
15 53	62.8	...	...								7	34.44	...
16 6	62.3	...	...								8	36.08	...
16 15	...	64.5	29.936								9	34.86	+10.87
2 12 31	...	67.5	30.076								10	36.10	+ 7.19
12 37	65.2	...	...								11	35.21	...
12 48	64.6	...	...								12	34.79	- 8.61
12 59	64.0	65.3	30.074								13	35.22	+14.26
13 13	61.95	...	...								14	36.20	...
13 24	62.1	...	...								15	35.52	...
13 35	62.0	64.0	30.076								16	35.84	- 5.35
13 48	61.7	...	...								17	35.74	- 1.23
14 1	61.5	63.0	30.078								18	35.78	+ 8.67
14 9	62.2	...	...								19	33.47	+ 1.91
14 25	62.0	...	...								
14 39	61.3	...	...								
14 50	60.6	...	...								
14 57	...	63.2	30.077										
3 12 12	...	73.0	29.980										
12 22	69.8	...	...								

Note.
7. Hazy.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	<i>f</i> Virginis	W	3	12 29 13.0	2 42.2	46.40	44.90	.....	171 49 51.25	+ 0.09	+ 15.94	- 54.26	- 5 18 2.55
		E	...	12 34 32.0	2 36.8	52.05	49.15	.....	260 15 8.48	+ 4.05	- 14.90	+ 54.25	
2	<i>d</i> ² Virginis	E	3	12 38 24.0	2 26.5	53.35	49.90	.....	246 45 24.10	+ 4.74	- 17.64	+ 33.21	+ 8 12 5.56
		W	...	12 44 3.0	3 12.5	47.75	45.70	.....	185 19 23.52	+ 0.99	+ 30.46	- 33.21	
3	43 H. Cephei s. p.	W	3	12 52 36.0	2 55.9	46.60	45.35	.....	271 21 50.85	+ 0.36	+ 1.19	+ 20.85	+ 85 44 4.00
		E	...	12 58 28.0	2 56.1	51.70	48.35	.....	160 43 13.50	+ 3.54	- 1.19	- 20.85	
4	Groombridge 2006	E	3	13 2 27.0	1 42.9	52.20	48.75	.....	166 48 26.85	+ 4.06	+ 0.10	- 1 4.95	+ 88 10 25.06
		W	...	13 8 48.0	4 38.1	47.70	45.75	.....	265 16 36.52	+ 1.19	- 0.14	+ 1 4.95	
5	<i>l</i> Ursæ Minoris	W	3	13 16 29.0	2 9.3	46.85	45.45	.....	262 22 9.00	+ 0.90	- 0.81	+ 58.70	+ 85 15 50.89
		E	...	13 21 12.0	2 33.7	52.50	49.00	.....	169 42 53.15	+ 4.17	+ 1.15	- 58.70	
6	350 G. Hydræ	E	4	13 25 32.0	1 47.9	52.90	49.35	.....	283 7 28.10	+ 4.33	- 4.73	+ 2 11.90	- 28 11 49.26
		W	...	13 30 6.0	2 46.1	48.35	45.95	.....	148 57 26.75	+ 1.29	+ 11.20	- 2 11.92	
7	48 Hydræ	W	3	13 51 57.0	2 45.5	46.90	45.45	.....	152 36 31.98	+ 0.82	+ 11.82	- 1 51.84	- 24 32 24.28
		E	...	13 57 25.0	2 42.5	52.00	48.45	.....	279 28 30.80	+ 3.84	- 11.39	+ 1 51.85	
8	9 H. Boötis	E	3	14 1 12.0	2 58.6	53.20	49.45	.....	210 37 7.28	+ 4.55	+ 1 42.69	- 5.33	+ 44 19 0.47
		W	...	14 7 8.0	2 57.4	47.40	45.65	.....	221 27 51.60	+ 0.75	- 1 41.31	+ 5.33	
9	3 C. Libræ	W	3	14 16 27.0	2 57.9	47.45	45.80	.....	152 46 46.60	+ 1.09	+ 13.69	- 1 50.93	- 24 22 7.44
		E	...	14 22 13.0	2 48.1	50.90	47.90	.....	279 18 17.12	+ 3.29	- 12.23	+ 1 50.92	
10	<i>σ</i> Boötis	E	3	14 27 28.0	3 7.2	51.45	48.10	.....	224 49 2.35	+ 3.38	- 1 24.33	+ 8.67	+ 30 10 0.44
		W	...	14 33 39.0	3 3.8	47.85	45.90	.....	207 16 3.12	+ 1.45	+ 1 21.30	- 8.67	
11	Piazzi 166	W	3	14 37 52.0	2 57.2	47.55	45.60	.....	156 22 38.20	+ 1.07	+ 14.43	- 1 35.65	- 20 46 0.32
	June 4, E.	E	...	14 43 46.0	2 56.8	50.50	47.75	.....	275 42 28.10	+ 3.03	- 14.36	+ 1 35.68	
12	<i>χ</i> Virginis	W	3	12 31 30.0	2 51.8	44.80	43.80	.....	169 40 3.90	+ 0.47	+ 17.16	- 58.04	- 7 27 55.16
		E	...	12 37 5.0	2 43.2	51.05	48.55	.....	262 25 0.45	+ 4.57	- 15.48	+ 58.04	
13	<i>ρ</i> Centauri	E	3	12 43 36.0	1 56.9	52.15	49.50	.....	288 23 30.35	+ 5.31	- 5.08	+ 2 52.21	- 33 28 31.28
		W	...	12 52 9.0	6 36.1	46.70	45.30	.....	143 40 38.88	+ 1.70	+ 58.26	- 2 52.36	
14	Groombridge 2006	W	3	13 2 35.0	1 34.1	45.70	44.70	.....	265 16 37.22	+ 1.12	- 0.16	+ 1 4.27	+ 88 10 24.57
		E	...	13 8 36.0	4 26.9	51.25	48.65	.....	166 48 25.32	+ 4.76	+ 1.27	- 1 4.28	
15	<i>l</i> Ursæ Minoris	E	3	13 15 47.0	2 50.8	51.50	48.60	.....	169 42 52.05	+ 4.75	+ 1.42	- 58.15	+ 85 15 52.32
		W	...	13 21 47.0	3 9.2	46.55	45.35	.....	262 22 12.82	+ 1.73	- 1.74	+ 58.15	
16	81 Ursæ Majoris	W	3	13 27 46.0	2 44.7	46.20	44.90	.....	232 58 11.80	+ 1.42	- 22.19	+ 16.93	+ 55 50 50.50
		E	...	13 33 19.0	2 48.3	51.10	48.25	.....	199 6 50.02	+ 4.46	+ 23.17	- 16.93	
17	<i>ι</i> Centauri	E	4	13 37 54.0	2 23.6	51.55	48.85	.....	287 28 35.25	+ 4.93	- 7.78	+ 2 44.04	- 32 33 24.92
		W	...	13 46 30.0	6 12.4	45.95	45.05	.....	144 35 43.35	+ 1.35	+ 52.31	- 2 44.16	
18	9 H. Boötis	W	3	14 1 7.0	3 3.3	44.95	44.20	.....	221 28 0.62	+ 0.72	- 1 48.18	+ 5.30	+ 44 19 1.00
		E	...	14 7 5.0	2 54.7	49.20	47.20	.....	210 37 13.90	+ 3.33	+ 1 38.30	- 5.30	
19	<i>f</i> Boötis	E	3	14 18 57.0	3 7.2	51.50	48.40	.....	235 18 23.82	+ 4.71	- 42.44	+ 19.53	+ 19 39 45.66
		W	...	14 25 5.0	3 0.8	45.55	44.80	.....	196 46 42.02	+ 1.10	+ 39.59	- 19.53	

Time	Ther- 38.2	At- ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
3 12 32	69.2	...	...		1	216 2 32.45	...
12 41	68.4	...	...		2	33.08	+ 7.82
12 49	...	70.2	29.972		3	34.12	...
12 56	67.1	...	...		4	34.14	- 10.29
13 6	67.0	...	...		5	33.78	- 10.15
13 19	66.9	69.2	29.975		6	33.46	+ 15.31
13 28	66.6	...	...		7	33.94	...
13 55	66.1	...	...		8	32.78	- 4.33
14 4	66.6	...	...		9	34.78	+ 10.15
14 12	...	68.5	29.979		10	33.64	- 1.80
14 19	66.6	...	...		11	35.25	+ 7.68
14 31	66.5	...	...		12	35.54	+ 11.02
14 41	66.4	...	...		13	34.64	+ 19.71
4 12 14	74.3	76.0	30.014		14	34.76	- 10.44
12 48	73.8	...	...		15	35.52	- 10.14
13 0	...	75.0	30.012		16	34.14	- 6.52
13 6	73.2	...	...	11 E. One microscope reading decreased 20".	17	34.64	+ 15.18
13 19	72.6	...	...	12. Disturbed by clouds.	18	34.14	...
13 26	...	74.1	30.040	17. Hazy.	19	34.40	- 4.58
13 31	72.2	...	...		
13 42	71.8	...	...		
13 58	...	74.9	30.044				
14 4	70.5	...	...		
14 22	69.9	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	142 H ¹ . Cephei S. P.	W	3	14 31 0.0	2 51.3	45.00	44.85	.....	276 3 32.88	+ 0.85	+ 2.24	+1 36.66	+81 2 6.80
	June 8, E.	E	...	14 36 36.0	2 44.7	49.20	46.55	.....	156 1 35.75	+ 2.96	- 2.07	-1 36.65	
2	i Centauri	W	4	13 37 56.0	2 20.0	45.10	44.00	.....	144 36 28.12	+ 1.36	+ 7.39	-2 42.06	-32 33 25.40
		E	...	13 42 49.0	2 33.0	51.70	48.40	.....	287 28 38.82	+ 5.48	- 8.83	+2 42.99	
3	47 Hydræ	E	5	13 50 39.0	2 32.1	52.65	49.00	.....	279 26 14.08	+ 6.15	- 9.99	+1 49.91	-24 30 7.66
		W	...	13 56 27.0	3 15.9	46.05	44.65	.....	152 38 42.50	+ 1.92	+ 16.57	-1 49.92	
4	94 Virginis	W	3	13 59 54.0	1 21.8	44.90	44.10	.....	168 42 23.02	+ 1.37	+ 3.82	- 59.94	- 8 25 51.46
		E	...	14 3 16.0	2 0.2	51.30	48.10	.....	263 22 48.08	+ 5.18	- 8.25	+ 59.95	
5	4 Ursæ Minoris	E	3	14 7 21.0	1 57.7	51.95	48.85	.....	176 58 6.22	+ 5.88	+ 1.94	- 44.91	+78 0 23.00
		W	...	14 11 28.0	2 9.3	45.80	44.85	.....	255 6 56.90	+ 1.89	- 2.34	+ 44.91	
6	g Boötis	W	3	14 23 23.0	1 58.2	44.50	43.80	.....	227 24 17.15	+ 1.11	- 19.24	+ 11.13	+50 16 51.94
		E	...	14 27 40.0	2 18.8	49.55	47.30	.....	204 40 40.35	+ 4.29	+ 26.53	- 11.13	
7	34 Boötis	E	3	14 36 21.0	2 54.6	51.55	48.15	.....	228 2 5.08	+ 5.42	- 55.51	+ 11.75	+26 56 25.88
		W	...	14 41 59.0	2 43.4	45.30	43.90	.....	204 3 6.62	+ 1.25	+ 48.63	- 11.75	
8	ξ ² Libræ	W	2	14 48 46.0	2 50.7	44.30	43.65	.....	166 6 56.68	+ 0.86	+ 15.86	-1 5.64	-11 1 11.26
		E	...	14 54 22.0	2 45.3	51.15	48.05	.....	265 58 8.02	+ 5.24	- 14.87	+1 5.64	
9	c Boötis	E	2	15 0 13.0	2 55.5	52.25	48.40	.....	229 43 32.90	+ 5.48	- 49.98	+ 13.48	+25 14 49.98
		W	...	15 5 50.0	2 41.5	45.40	43.95	.....	202 21 38.02	+ 1.20	+ 42.34	- 13.47	
10	η Coronæ Borealis	W	2	15 16 21.0	2 56.9	43.90	43.00	.....	207 44 28.62	+ 0.51	+1 19.21	- 8.08	+30 38 20.19
	June 9, H.	E	...	15 22 5.0	2 47.1	51.75	48.65	.....	224 20 30.62	+ 5.62	-1 10.68	+ 8.08	
11	i Virginis	E	...	13 18 38.0	3 3.4	48.95	50.95	.....	267 9 18.40	+ 2.26	- 17.92	+1 7.74	-12 12 20.98
		W	...	13 24 32.0	2 50.6	49.95	51.00	.....	164 55 44.40	+ 2.59	+ 15.51	-1 7.74	
12	13 B. Ursæ Minoris	W	...	13 31 52.0	3 3.9	48.15	50.25	.....	248 51 6.22	+ 1.69	- 8.30	+ 35.29	+71 44 17.78
	June 14, H.	E	...	13 37 53.0	2 57.1	46.10	48.50	.....	183 14 0.45	+ 0.24	+ 7.69	- 35.29	
13	2 Libræ	W	...	14 15 20.0	2 57.5	46.45	46.90	.....	165 51 44.32	+ 0.07	+ 17.06	-1 7.33	-11 16 22.99
	June 15, E.	E	...	14 21 25.0	3 7.5	48.00	48.05	.....	266 13 24.48	+ 1.10	- 19.04	+1 7.33	
14	4 Ursæ Minoris	E	3	14 5 14.0	4 2.6	52.05	50.10	.....	176 58 0.15	+ 3.45	+ 8.23	- 45.26	+78 0 23.23
		W	...	14 13 9.0	3 52.4	48.65	48.05	.....	255 7 0.18	+ 1.35	- 7.55	+ 45.26	
15	52 Hydræ	W	4	14 19 43.0	2 51.7	48.35	48.05	.....	148 5 48.55	+ 1.22	+ 11.80	-2 16.84	-29 3 31.57
		E	...	14 25 17.0	2 42.3	49.45	49.20	.....	283 59 13.22	+ 2.15	- 10.54	+2 16.82	
16	c ¹ Centauri	E	4	14 34 58.0	2 50.9	50.75	50.00	.....	289 40 21.85	+ 2.08	- 10.61	+3 7.71	-34 45 31.98
		W	...	14 41 7.0	3 18.1	48.90	48.35	.....	142 24 36.05	+ 1.61	+ 14.26	-3 7.73	
17	381 G. Centauri	W	4	14 46 48.0	3 5.0	47.70	47.50	.....	143 42 4.70	+ 0.86	+ 12.71	-2 53.70	-33 27 51.38
		E	...	14 52 37.0	2 44.0	49.05	48.65	.....	288 22 55.65	+ 1.77	- 9.99	+2 53.68	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
4 14 34	69.2	...	...								1	216 2 36.31	+10.41
14 54	...	70.8	30.040								2	36.18	+15.32
8 13 20	...	71.8	29.706								3	35.61	+12.40
13 40	69.6	...	...								4	36.62	...
13 54	69.7	71.2	29.720								5	35.24	...
14 2	69.5	...	...								6	35.10	- 6.90
14 9	69.2	...	...								7	35.74	- 2.56
14 15	...	71.2	29.722								8	35.90	...
14 25	69.4	...	...								9	34.98	- 2.90
14 39	69.7	...	...								10	36.90	...
14 52	69.5	...	...								11	32.62	+11.46
15 3	69.4	...	...								12	34.00	-10.01
15 9	...	71.2	29.710								13	34.00	+ 7.21
15 19	68.8	...	...								14	32.90	...
15 26	...	70.8	29.715								15	33.19	+11.20
9 13 13	...	78.0	29.780								16	33.06	+11.00
13 22	76.0	...	...								17	32.84	+ 9.57
13 35	75.9	77.5	29.788										
14 14 18	58.5	61.5	29.542										
15 14 2	...	65.8	29.624										
14 9	63.7	...	...								
14 22	63.3	...	...								
14 31	...	65.0	29.616										
14 38	62.8	...	...								
14 50	62.3	...	...								

Notes.

2-10. Clouds.
 10 E. One microscope reading decreased 20".
 11 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	<i>i</i> Boötis (<i>n. fol.</i>)	E	3	14 57 41.0	2 59.2	50.00	49.15	.....	206 54 57.45	+ 2.31	+ 57.48	- 8.99	+48 2 2.85
		W	...	15 3 14.0	2 33.8	48.10	48.20	.....	225 9 52.30	+ 1.22	- 42.34	+ 8.99	
2	<i>γ</i> Coronæ Borealis	W	3	15 16 8.0	3 8.4	46.80	47.05	.....	207 44 16.52	+ 0.34	+ 1 29.83	- 8.17	+30 38 21.29
		E	...	15 22 19.0	3 2.6	49.45	49.00	.....	224 20 43.85	+ 2.08	- 1 24.37	+ 8.17	
3	149 H ¹ . Cephei s. p.	E	3	15 31 37.0	3 16.1	49.50	48.50	.....	161 19 27.45	+ 1.82	- 1.28	- 1 18.91	+86 20 19.47
		W	...	15 37 47.0	2 53.9	48.80	48.30	.....	270 45 34.95	+ 1.49	+ 1.00	+ 1 18.91	
4	<i>χ</i> Lupi	W	4	15 42 7.0	2 46.4	49.05	48.50	.....	143 49 58.85	+ 1.65	+ 10.31	- 2 52.55	-33 19 58.57
	June 18, E.	E	...	15 47 29.0	2 35.6	49.45	49.15	.....	288 15 3.52	+ 2.13	- 9.01	+ 2 52.55	
5	81 Ursæ Majoris	W	2	13 27 25.0	3 0.7	42.90	47.45	.....	232 58 17.92	+ 0.42	- 26.71	+ 16.94	+55 50 51.91
		E	...	13 33 22.0	2 56.3	43.40	48.20	.....	199 6 49.22	+ 0.83	+ 25.43	- 16.94	
6	<i>h</i> Centauri	E	4	13 44 48.0	2 53.0	45.05	49.15	.....	286 22 36.12	+ 1.83	- 11.50	+ 2 34.16	-31 27 9.07
		W	...	13 50 51.0	3 10.0	46.25	49.65	.....	145 42 26.50	+ 2.49	+ 13.87	- 2 34.16	
7	9 H. Boötis	W	2	14 1 5.0	3 0.4	44.05	48.35	.....	221 27 59.55	+ 0.85	- 1 44.80	+ 5.28	+44 19 3.16
		E	...	14 7 56.0	3 50.6	43.40	48.45	.....	210 36 1.80	+ 0.99	+ 2 50.87	- 5.32	
8	5 Ursæ Minoris	W	2	14 24 17.0	3 28.4	45.90	49.90	.....	253 14 30.62	+ 2.47	- 7.30	+ 42.25	+76 7 49.81
		E	...	14 31 27.0	3 41.6	44.65	48.45	.....	178 50 34.82	+ 1.38	+ 8.26	- 42.25	
9	Piazzi 166	E	3	14 37 43.0	3 1.3	45.45	49.25	.....	275 42 30.58	+ 2.03	- 15.11	+ 1 34.96	-20 46 0.53
		W	...	14 43 37.0	2 52.7	48.25	50.55	.....	156 22 35.38	+ 3.50	+ 13.71	- 1 34.96	
10	5 ² Libræ	W	2	14 48 53.0	2 40.6	47.25	50.30	.....	166 6 57.65	+ 3.00	+ 14.03	- 1 6.20	-11 1 9.82
		E	...	14 54 12.0	2 38.4	45.05	49.15	.....	265 58 7.42	+ 1.93	- 13.65	+ 1 6.20	
11	<i>i</i> Boötis (<i>n. fol.</i>)	E	3	14 58 12.0	2 26.5	45.70	49.35	.....	206 55 16.52	+ 1.99	+ 38.43	- 8.96	+48 2 3.33
		W	...	15 3 1.0	2 22.5	48.40	50.85	.....	225 9 44.82	+ 3.45	- 36.37	+ 8.96	
12	1 Lupi	W	3	15 7 19.0	1 25.6	48.00	50.65	.....	146 0 11.65	+ 3.56	+ 2.83	- 2 32.41	-31 9 32.47
		E	...	15 11 12.0	2 27.4	44.35	48.70	.....	286 4 58.98	+ 1.32	- 8.39	+ 2 32.43	
13	32 Libræ	E	2	15 19 42.0	3 8.7	46.45	49.90	.....	271 19 30.15	+ 2.44	- 17.64	+ 1 20.56	-16 22 44.09
		W	...	15 25 53.0	3 2.3	49.20	51.15	.....	160 45 33.78	+ 3.87	+ 16.46	- 1 20.56	
14	149 H ¹ . Cephei s. p.	W	2	15 31 34.0	3 18.2	48.00	50.90	.....	270 45 33.55	+ 3.39	+ 1.30	+ 1 18.87	+86 20 20.18
	June 21, H.	E	...	15 37 42.0	2 49.8	45.60	48.85	.....	161 19 29.40	+ 1.68	- 0.96	- 1 18.87	
15	3 G. Libræ	E	...	14 16 16.0	3 2.1	52.30	50.50	.....	279 18 19.65	+ 2.99	- 14.35	+ 1 49.29	-24 22 7.33
		W	...	14 22 17.0	2 58.9	53.40	50.80	.....	152 46 41.12	+ 3.45	+ 13.85	- 1 49.29	
16	6 B. Libræ	W	...	14 28 53.0	2 58.6	51.10	49.85	.....	165 14 25.60	+ 2.30	+ 17.09	- 1 7.76	-11 53 40.43
		E	...	14 34 53.0	3 1.4	49.55	49.40	.....	266 50 40.12	+ 1.59	- 17.63	+ 1 7.78	
17	<i>μ</i> Libræ	E	...	14 41 0.0	3 1.6	50.50	49.55	.....	268 41 40.92	+ 1.87	- 17.10	+ 1 12.44	-13 44 46.61
		W	...	14 46 58.0	2 56.4	52.25	50.60	.....	163 23 24.52	+ 2.93	+ 16.13	- 1 12.46	
18	<i>δ</i> Libræ	W	...	14 52 48.0	3 0.8	51.05	50.00	.....	168 59 51.95	+ 2.23	+ 18.76	- 59.39	- 8 8 5.25
		E	...	14 58 48.0	2 59.2	49.15	49.10	.....	263 5 15.60	+ 1.26	- 18.43	+ 59.41	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1901 c.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>mm.</i>			<i>' "</i>	<i>"</i>
15 15 0	62.0				1	216 2 34.21	- 8.36
15 15 9		63.8	29.608		2	34.12	
15 19	61.9				3	32.72	+11.93
15 35	61.9				4	33.72	+ 3.93
15 45	61.7				5	33.56	- 8.84
15 51		63.0	29.610		6	34.06	+14.82
18 11 21		71.2	29.755		7	34.61	- 7.29
18 11 30	67.1				8	35.12	
18 11 38	67.6				9	35.04	+ 7.70
18 11 46		69.2	29.753		10	35.19	
18 11 5	67.3				11	34.42	- 9.09
18 11 11		68.8	29.760		12	34.98	+ 7.40
18 11 28	66.9				13	34.53	
18 11 47	66.3				14	34.18	+12.63
18 11 57	66.1	68.0	29.758		15	33.16	+10.31
18 11 1	65.8				16	34.54	+ 5.06
18 11 9	65.5				17	34.62	+ 5.53
18 11 21	64.6				18	35.70	+ 3.22
18 11 35	64.7						
18 11 41		66.8	29.761				
21 14 5		70.5	29.656	Note. 6. Clouds.			
18 14 19	68.6						
18 14 32	68.2	70.5	29.658				
18 14 44	67.9						
18 14 56	68.3						

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 Lupi	E	...	15 5 42.0	3 0.8	50.30	49.95	.....	286 5 2.88	+ 2.05	-12.62	+2 31.30	-31 9 31.79
		W	...	15 11 50.0	3 7.2	53.10	50.80	.....	146 0 0.62	+ 3.40	+13.53	-2 31.30	
2	θ Ursæ Minoris	W	...	15 31 18.0	2 59.7	51.40	50.10	.....	254 47 8.52	+ 2.45	- 4.67	+ 44.62	+77 40 34.51
		E	...	15 37 17.0	2 59.3	48.45	48.55	.....	177 17 54.92	+ 0.73	+ 4.65	- 44.62	
3	χ Lupi	E	...	15 41 46.0	3 4.0	48.60	48.65	.....	288 15 11.82	+ 0.88	-12.60	+2 51.30	-33 19 59.31
		W	...	15 47 47.0	2 57.0	51.45	50.35	.....	143 49 56.12	+ 2.53	+11.66	-2 51.30	
4	49 Libræ	W	...	15 51 54.0	3 0.9	50.30	49.45	.....	160 53 26.88	+ 1.77	+16.24	-1 19.60	-16 14 52.25
		E	...	15 58 1.0	3 6.1	48.55	48.65	.....	271 11 40.32	+ 0.83	-17.19	+1 19.60	
5	151 H ¹ . Cephei s. p.	E	...	16 3 0.0	2 55.8	49.50	49.10	.....	160 16 57.00	+ 1.40	- 1.30	-1 21.55	+85 17 45.15
		W	...	16 8 57.0	3 1.2	51.25	50.20	.....	271 48 6.02	+ 2.53	+ 1.38	+1 21.55	
6	ρ Ophiuchi (<i>s. star</i>)	W	...	16 16 38.0	3 10.2	51.05	49.50	.....	153 55 18.85	+ 2.03	+15.96	-1 44.86	-23 13 25.13
		E	...	16 22 54.0	3 5.8	48.05	48.10	.....	278 9 46.00	+ 0.40	-15.23	+1 44.86	
7	42 Herculis	E	...	16 35 58.0	0 10.4	49.05	49.05	.....	205 50 46.82	+ 1.17	+ 0.17	- 10.04	+49 7 14.44
	June 23, E.	W	...	16 39 15.0	3 6.6	53.25	50.95	.....	226 15 14.32	+ 3.42	-54.50	+ 10.04	
8	48 Hydræ	W	2	13 51 39.0	2 56.8	50.60	48.45	.....	152 36 29.08	+ 0.74	+13.49	-1 51.31	-24 32 23.81
		E	...	13 57 50.0	3 14.2	49.65	48.15	.....	279 28 38.05	+ 0.30	-16.27	+1 51.31	
9	4 Ursæ Minoris	E	3	14 6 15.0	2 57.8	50.80	48.90	.....	176 58 4.92	+ 1.03	+ 4.42	- 45.38	+78 0 24.97
		W	...	14 12 23.0	3 10.2	51.50	49.15	.....	255 6 59.50	+ 1.34	- 5.06	+ 45.38	
10	52 Hydræ	W	3	14 20 2.0	2 29.4	52.10	49.55	.....	148 5 52.60	+ 1.69	+ 8.93	-2 17.23	-29 3 31.05
		E	...	14 25 20.0	2 48.6	51.70	49.10	.....	283 59 14.62	+ 1.37	-11.37	+2 17.24	
11	142 H ¹ . Cephei s. p.	E	3	14 30 40.0	3 7.3	52.20	49.75	.....	156 1 32.85	+ 1.83	- 2.68	-1 36.86	+81 2 3.85
		W	...	14 36 48.0	3 0.7	52.05	49.55	.....	276 3 32.60	+ 1.68	+ 2.50	+1 36.87	
12	μ Libræ	W	3	14 41 34.0	2 27.8	51.90	49.35	.....	163 23 31.50	+ 1.54	+11.32	-1 13.42	-13 44 46.56
		E	...	14 46 3.0	2 1.2	51.35	49.50	.....	268 41 30.58	+ 1.44	- 7.61	+1 13.43	
13	43 B. Libræ	E	3	14 49 43.0	2 7.0	52.20	49.80	.....	275 55 8.70	+ 1.87	- 7.39	+1 36.44	-20 58 49.07
		W	...	14 53 50.0	2 0.0	52.15	49.25	.....	156 9 56.00	+ 1.56	+ 6.59	-1 36.45	
14	57 B. Ursæ Minoris	W	2	15 5 20.0	3 0.1	49.65	48.10	.....	264 42 51.00	+ 0.27	- 0.76	+1 3.82	+87 36 36.21
	June 25, E.	E	...	15 11 21.0	3 0.9	51.90	49.80	.....	167 22 16.95	+ 1.79	+ 0.77	-1 3.82	
15	5 Ursæ Minoris	E	3	14 24 48.0	2 54.9	54.50	50.70	.....	178 50 33.68	+ 1.21	+ 5.15	- 42.32	+76 7 51.75
	June 30, E.	W	...	14 30 15.0	2 32.1	52.60	49.50	.....	253 14 28.95	+ 0.07	- 3.89	+ 42.32	
16	δ Libræ	W	3	14 52 59.0	2 47.4	48.85	47.65	.....	168 59 51.62	+ 1.15	+16.08	- 58.58	- 8 8 6.86
		E	...	14 58 29.0	2 42.6	50.90	49.45	.....	263 5 11.58	+ 2.76	-15.17	+ 58.60	
17	ε Serpentis	W	3	15 34 40.0	2 32.4	47.40	46.65	.....	197 6 11.30	+ 0.53	+28.54	- 18.79	+19 59 3.24
		E	...	15 39 38.0	2 25.6	50.70	49.65	.....	234 58 53.28	+ 2.86	-26.04	+ 18.78	
18	π Scorpii	E	3	15 50 22.0	2 36.7	52.50	50.35	.....	280 46 11.30	+ 3.88	-10.37	+1 55.44	-25 50 8.71
		W	...	15 55 53.0	2 54.3	50.70	48.45	.....	151 18 49.38	+ 2.29	+12.83	-1 55.44	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
21 15 9	67.8	70.0	29.678								1	216 2 34.93	+ 7.47
15 35	65.9	...	...								2	33.30	-13.10
15 45	66.4	68.0	29.676								3	35.20	+ 4.24
15 54	66.7	...	...								4	34.42	...
16 6	65.9	68.0	29.676								5	33.52	...
16 20	65.4	...	...								6	34.00	- 0.73
16 36	65.3	67.5	29.682								7	35.67	-10.54
23 13 34	...	64.8	29.638								8	32.70	...
13 55	62.9	...	...								9	33.08	...
14 9	62.7	...	...								10	33.92	+11.30
14 17	...	63.5	29.641								11	34.40	+13.53
14 23	62.3	...	...								12	34.30	+ 5.46
14 34	61.6	...	...								13	33.66	...
14 44	61.1	...	...								14	35.01	...
14 52	61.1	...	...								15	32.58	...
15 8	60.9	...	...								16	34.02	+ 2.84
15 17	...	62.8	29.666								17	35.23	- 0.89
25 13 54	...	69.2	29.808								18	34.66	+ 2.53
14 28	66.9	...	...								
14 40	...	67.6	29.824										
30 14 45	...	78.8	29.808										
14 56	77.4	...	...								
15 37	76.5	...	...								
15 45	...	78.2	29.814										
15 53	76.0	...	...								

Notes.
6. Assumed that south star was observed.
14, 16. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	κ Herculis	W	3	16 0 40.0	3 0.8	49.35	47.90	.....	194 25 27.72	+ 1.50	+ 35.95	- 21.72	+17 18 26.56
		E	...	16 6 55.0	3 14.2	52.75	50.55	.....	237 39 40.08	+ 3.78	- 41.47	+ 21.72	
2	23 Herculis	E	3	16 16 14.0	2 58.4	53.70	50.75	.....	222 25 40.15	+ 4.17	- 1 42.52	+ 6.14	+32 33 42.18
		W	...	16 22 28.0	3 15.6	51.85	48.85	.....	209 38 58.68	+ 2.80	+ 2 3.18	- 6.14	
	July 1, E.												
3	σ Boötis	W	3	14 28 4.0	2 21.7	47.90	47.20	.....	207 16 42.65	+ 1.15	+ 48.38	- 8.32	+30 10 5.13
		E	...	14 32 41.0	2 15.3	51.85	50.00	.....	224 48 19.48	+ 3.71	- 44.11	+ 8.31	
4	Piazz 160	E	3	14 38 3.0	2 36.0	53.55	51.10	.....	275 42 28.50	+ 4.77	- 11.32	+ 1 31.85	-20 45 59.93
		W	...	14 43 12.0	2 32.1	52.80	49.80	.....	156 22 37.48	+ 3.91	+ 10.63	- 1 31.86	
5	δ Libræ	W	2	14 53 28.0	2 18.3	51.70	49.20	.....	168 59 55.82	+ 3.25	+ 10.98	- 57.95	- 8 8 6.85
		E	...	14 58 27.0	2 40.7	53.05	50.95	.....	263 5 11.72	+ 4.72	- 14.82	+ 57.95	
6	57 B. Ursæ Minoris	E	2	15 5 19.0	2 55.0	55.40	51.80	.....	167 22 12.40	+ 5.68	+ 0.72	- 1 1.39	+87 36 36.81
		W	...	15 11 11.0	2 57.0	53.45	50.25	.....	264 42 52.28	+ 4.32	- 0.74	+ 1 1.39	
7	32 Libræ	W	2	15 20 7.0	2 39.4	52.85	49.65	.....	160 45 37.00	+ 3.83	+ 12.59	- 17.93	-16 22 44.53
		E	...	15 25 24.0	2 37.6	53.90	50.45	.....	271 19 28.15	+ 4.55	- 12.30	+ 17.93	
8	κ Libræ	E	3	15 33 20.0	3 0.8	54.55	51.10	.....	274 18 29.92	+ 5.07	- 15.38	+ 1 27.35	-19 21 54.41
		W	...	15 39 13.0	2 52.2	54.40	50.80	.....	157 46 32.88	+ 4.89	+ 13.95	- 1 27.35	
9	ρ Scorpii	W	3	15 47 40.0	3 4.4	53.50	50.00	.....	148 13 19.85	+ 4.20	+ 13.63	- 2 12.10	-28 55 54.83
		E	...	15 53 48.0	2 54.6	54.25	51.00	.....	283 51 44.22	+ 4.91	- 12.22	+ 2 12.11	
10	ω^2 Scorpii	E	3	15 58 37.0	3 5.5	54.90	51.25	.....	275 32 56.98	+ 5.24	- 15.86	+ 1 31.93	-20 36 25.03
		W	...	16 4 51.0	3 8.5	54.10	50.35	.....	156 32 5.45	+ 4.58	+ 16.38	- 1 31.95	
11	19 Ursæ Minoris	W	3	16 10 56.0	2 37.8	52.40	49.20	.....	253 14 13.80	+ 3.50	- 4.19	+ 41.21	+76 7 34.27
		E	...	16 16 8.0	2 34.2	53.60	50.40	.....	178 50 52.32	+ 4.44	+ 4.00	- 41.21	
12	N Scorpii	E	4	16 22 14.0	2 48.6	54.85	50.95	.....	289 24 36.22	+ 5.10	- 10.37	+ 2 59.46	-34 29 37.22
		W	...	16 27 50.0	2 47.4	54.80	50.50	.....	142 40 26.60	+ 4.86	+ 10.22	- 2 59.49	
	July 2, H.												
13	34 Boötis	E	...	14 36 33.0	2 34.2	55.85	52.45	.....	228 1 49.85	+ 4.38	- 43.32	+ 11.40	+26 56 31.07
		W	...	14 41 47.0	2 39.8	54.45	51.35	.....	204 3 12.18	+ 3.39	+ 46.52	- 11.41	
14	c Boötis	W	...	15 0 3.0	2 57.1	50.30	48.35	.....	202 21 35.25	+ 0.68	+ 50.90	- 13.10	+25 14 56.42
		E	...	15 6 4.0	3 3.9	53.50	50.55	.....	229 43 33.72	+ 2.73	- 54.88	+ 13.10	
15	η Coronæ Borealis	E	...	15 16 20.0	2 49.5	56.10	51.70	.....	224 20 26.15	+ 4.06	- 12.74	+ 7.86	+30 38 27.01
		W	...	15 22 17.0	3 7.5	54.65	50.30	.....	207 44 21.50	+ 2.94	+ 1 29.00	- 7.87	
16	49 Libræ	W	...	15 51 55.0	2 56.6	52.30	50.00	.....	160 53 27.70	+ 2.09	+ 15.48	- 17.27	-16 14 50.87
		E	...	15 57 50.0	2 58.4	53.90	50.55	.....	271 11 39.20	+ 2.85	- 15.79	+ 17.27	
17	151 H ¹ . Cepheis. P.	E	...	16 2 58.0	2 56.7	54.55	50.70	.....	160 16 50.32	+ 3.12	- 1.31	- 1 19.12	+85 17 41.95
		W	...	16 9 29.0	3 34.3	53.55	50.00	.....	271 48 11.85	+ 2.45	+ 1.93	+ 1 19.11	
18	σ Serpentis	W	...	16 15 2.0	2 5.9	53.10	49.55	.....	178 23 16.08	+ 2.12	+ 11.00	- 41.62	+ 1 15 29.12
		E	...	16 19 3.0	1 55.1	53.45	50.95	.....	253 41 48.22	+ 2.48	- 9.20	+ 41.62	

Time.	Ther- 3882	Att. ther	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>in</i>						<i>° ' "</i>	<i>"</i>
19 16 4	76.0		...					1	216 2 33.78	...
19 16 19	75.8		...					2	33.23	-10.04
19 16 16		77.5	29.800					3	35.62	-6.75
1 14 17		85.2	29.700					4	36.08	+ 7.60
14 30	80.1							5	35.84	+ 2.76
14 41	80.1							6	37.11	
14 46	81.1	81.1	29.699					7	36.01	
15 8	80.9	82.8	29.702					8	35.66	
15 23	80.4							9	37.10	+ 3.19
15 46	79.8	82.5	29.708					10	36.08	+ 6.60
15 44	79.8	82.0	29.700					11	36.04	.....
15 52	79.1							12	36.00	+ 0.98
16 2	78.6							13	36.60	-6.45
16 13	78.1							14	34.90	-7.04
16 21	78.7							15	35.45	
16 31		80.1	29.721					16	35.76	
1 18 19	86.0	86.5	29.794					17	34.18	
1 1	84.9							18	35.15	5.29
1 11		85.0	29.794							
1 19	83.8									
1 40		86.5	29.802							
1 55	81.9									
1 6	81.1									
1 17	81.5									
1 24		86.5	29.804							

Note.

15 W. One microscope reading increased 10"

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ξ ² Libræ	E	...	14 48 52.0	2 37.0	47.55	48.75	.....	265 58 6.85	+ 2.90	-13.41	+1 4.79	-11 1 9.84
		W	...	14 54 36.0	3 7.0	46.30	47.00	.....	166 6 51.88	+ 1.57	+19.03	-1 4.79	
2	α ² Libræ	W	...	15 14 34.0	3 2.1	44.15	46.45	.....	162 20 55.20	+ 0.64	+16.88	-1 14.30	-14 47 18.48
		E	...	15 20 38.0	3 1.9	44.50	47.55	.....	269 44 10.30	+ 1.37	-16.84	+1 14.30	
3	θ Ursæ Minoris	E	...	15 31 17.0	2 56.9	46.20	48.05	.....	177 17 49.80	+ 1.92	+ 4.53	- 43.90	+77 40 36.97
		W	...	15 37 21.0	3 7.1	46.80	48.30	.....	254 47 11.38	+ 2.30	- 5.06	+ 43.91	
4	49 Libræ	W	...	15 51 57.0	2 55.2	44.75	46.75	.....	160 53 28.35	+ 0.89	+15.23	-1 18.63	-16 14 51.47
		E	...	15 57 51.0	2 58.8	43.50	46.50	.....	271 11 39.42	+ 0.36	-15.87	+1 18.63	
5	c ¹ Scorpii	E	...	16 3 17.0	3 2.2	44.60	46.95	.....	282 36 28.38	+ 1.08	-13.59	+2 5.93	-27 40 31.62
		W	...	16 9 20.0	3 0.8	47.80	48.45	.....	149 28 34.58	+ 2.77	+13.38	-2 5.94	
6	N Scorpii	W	...	16 21 59.0	3 3.4	45.75	47.50	.....	142 40 27.52	+ 1.70	+12.27	-3 1.87	-34 29 36.68
		E	...	16 28 3.0	3 0.6	43.50	46.20	.....	289 24 36.42	+ 0.36	-11.90	+3 1.86	
7	ε Scorpii	E	...	16 40 55.0	2 57.7	44.25	46.50	.....	289 2 4.22	+ 0.79	-11.60	+2 57.72	-34 7 1.44
		W	...	16 46 52.0	2 59.3	49.25	49.15	.....	143 2 56.90	+ 3.50	+11.81	-2 57.72	
8	July 7, H. 1 Lupi	W	...	15 5 41.0	2 58.0	47.95	48.25	.....	145 59 59.88	+ 5.75	+12.24	-2 29.72	-31 9 31.65
		E	...	15 11 45.0	3 6.0	42.00	44.95	.....	286 5 6.48	+ 2.35	-13.36	+2 29.74	
9	χ Lupi	W	...	15 41 47.0	2 59.2	55.00	51.35	.....	143 49 53.72	+ 9.42	+11.95	-2 49.74	-33 19 58.56
		E	...	15 47 43.0	2 56.8	48.95	48.10	.....	288 15 12.10	+ 6.00	-11.64	+2 49.78	
10	ω ² Scorpii	E	...	15 58 46.0	2 55.2	50.40	48.90	.....	275 32 55.28	+ 6.85	-14.14	+1 33.32	-20 36 22.84
		W	...	16 4 39.0	2 57.8	56.20	52.65	.....	156 32 10.12	+10.47	+14.57	-1 33.30	
11	σ Scorpii	W	...	16 12 15.0	3 1.0	56.05	52.10	.....	151 47 17.12	+10.12	+13.94	-1 54.41	-25 21 36.16
		E	...	16 18 20.0	3 4.0	49.85	48.55	.....	280 17 46.35	+ 6.49	-14.41	+1 54.43	
12	34 Herculis	E	...	16 24 28.0	2 55.5	50.85	49.10	.....	205 46 36.12	+ 7.09	+47.96	- 10.02	+49 10 33.98
		W	...	16 30 28.0	3 4.5	56.50	52.20	.....	226 18 27.98	+10.34	-52.98	+ 10.02	
13	July 8, H. 1 Lupi	E	...	15 5 48.0	2 50.9	53.00	51.20	.....	286 5 3.55	+ 2.14	-11.28	+2 29.11	-31 9 32.71
		W	...	15 11 41.0	3 2.1	52.65	49.85	.....	145 59 59.32	+ 1.32	+12.81	-2 29.11	
14	149 H ¹ . Cephei s. p.	W	...	15 31 37.0	3 15.4	51.05	49.90	.....	270 45 38.88	+ 0.87	+ 1.27	+1 17.20	+86 20 17.92
		E	...	15 37 39.0	2 46.6	50.40	48.80	.....	161 19 25.78	+ 0.16	- 0.92	-1 17.20	
15	κ Herculis	E	...	16 0 35.0	3 4.3	52.00	50.25	.....	237 39 37.05	+ 1.33	-37.35	+ 21.72	+17 18 27.49
		W	...	16 6 42.0	3 2.7	52.50	49.95	.....	194 25 27.62	+ 1.37	+36.70	- 21.72	
16	N Scorpii	W	...	16 22 3.0	2 58.3	50.20	49.10	.....	142 40 30.32	+ 0.31	+11.60	-3 1.06	-34 29 35.76
		E	...	16 28 2.0	3 0.7	50.80	49.25	.....	289 24 36.72	+ 0.56	-11.91	+3 1.07	
17	July 19, H. ε Serpentis	E	...	15 34 12.0	2 58.1	47.95	52.15	.....	234 58 58.78	+ 3.50	-38.98	+ 18.70	+19 59 7.56
		W	...	15 40 21.0	3 10.9	45.70	50.50	.....	197 5 55.42	+ 1.88	+44.76	- 18.70	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
6 14 45	...	82.5	29.942				1	216 2 34.41	.....
14 52	80.1	...	...				2	33.78	.....
15 18	79.2	...	...				3	32.44	-16.21
15 25	...	81.5	29.952				4	34.19	.....
15 34	78.7	...	...				5	33.30	+ 1.64
15 55	77.6	...	...				6	33.18	+ 1.19
16 6	77.1	...	...				7	32.81	.....
16 10	...	79.5	29.956				8	36.68	+ 8.06
16 25	76.0	...	...				9	40.80	+ 5.11
16 44	76.0	...	...				10	41.58	+ 0.44
16 50	...	78.5	29.958				11	39.82	.....
7 14 58	...	80.0	29.966				12	38.26	-14.77
15 9	77.9	...	...				13	33.93	+ 8.05
15 36	...	78.0	29.964				14	33.02	+16.26
15 45	75.7	...	...				15	33.36	.....
16 2	75.5	77.0	29.968				16	33.80	+ 1.31
16 15	72.4	...	...				17	32.68	- 9.74
16 27	73.7	...	...				
16 34	...	75.5	29.970						
8 15 0	...	81.0	29.872						
15 9	78.4	...	...				
15 35	77.3	...	...				
15 56	...	79.5	29.874						
16 4	77.1	...	...				
16 25	77.0	...	...				
16 32	...	79.0	29.886						
19 15 30	...	78.5	29.638						
15 37	75.9	...	...				

Note.
11 E. One level reading decreased 5 div.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Scorpii	W	...	15 47 51.0	3 0.2	45.05	50.20	...	148 13 21.30	+ 1.61	+13.02	-2 12.87	-28 55 53.95
		E	...	15 53 51.0	2 59.8	45.45	50.75	...	283 51 42.85	+ 1.95	-12.96	+2 12.88	
2	ω^2 Scorpii	E	...	15 58 43.0	2 57.3	46.70	51.10	...	275 32 53.75	+ 2.61	-14.49	+1 32.41	-20 36 24.29
		W	...	16 4 42.0	3 1.7	45.50	50.15	...	156 32 7.50	+ 1.67	+15.21	-1 32.44	
3	N Scorpii	W	...	16 22 3.0	2 57.5	44.50	49.70	...	142 40 27.48	+ 1.31	+11.49	-3 0.77	-34 29 36.50
		E	...	16 28 1.0	3 0.5	44.30	49.60	...	289 24 36.20	+ 1.18	-11.89	+3 0.78	
4	139 G. Scorpii	W	...	17 7 45.0	2 58.1	42.95	48.95	...	144 36 36.30	+ 0.45	+11.97	-2 41.47	-32 33 7.78
		E	...	17 13 50.0	3 6.9	43.55	49.00	...	287 28 27.62	+ 0.68	-13.18	+2 41.46	
5	August 17, H. 157 H ¹ . Cephei S. P.	E	...	16 54 20.0	3 0.3	49.85	49.55	...	160 48 49.40	+ 3.03	- 1.22	-1 19.94	+85 49 41.10
		W	...	17 0 20.0	2 59.7	53.30	51.20	...	271 16 9.28	+ 4.96	+ 1.22	+1 19.94	
6	ξ Ophiuchi	W	...	17 12 9.0	2 55.8	51.40	50.10	...	156 8 8.80	+ 3.85	+14.15	-1 35.65	-21 0 26.30
		E	...	17 18 12.0	3 7.2	46.75	48.00	...	275 56 56.50	+ 1.32	-16.04	+1 35.65	
7	158 H ¹ . Cephei S. P.	E	...	17 27 50.0	2 56.8	47.85	48.35	...	160 7 47.55	+ 1.73	- 1.36	-1 22.08	+85 8 35.39
		W	...	17 33 52.0	3 5.2	53.50	50.90	...	271 57 13.02	+ 4.77	+ 1.49	+1 22.10	
8	87 Hercules	W	...	17 42 2.0	2 43.9	52.25	50.45	...	202 46 18.60	+ 4.27	+44.77	- 13.14	+25 39 38.12
		E	...	17 47 50.0	3 4.1	47.70	47.80	...	229 18 53.75	+ 1.52	-50.47	+ 13.14	
9	70 Ophiuchi (mean)	E	...	17 57 34.0	2 52.3	48.70	48.50	...	252 25 53.88	+ 2.05	-21.18	+ 41.03	+ 2 31 35.41
		W	...	18 3 31.0	3 4.7	55.00	51.75	...	179 39 3.95	+ 5.66	+24.34	- 41.03	
10	δ Sagittarii	W	...	18 11 47.0	2 53.9	53.20	50.90	...	147 17 21.85	+ 4.66	+11.93	-2 22.28	-29 52 0.99
		E	...	18 17 43.0	3 2.1	46.75	47.05	...	284 47 41.85	+ 0.77	-13.09	+2 22.29	
11	84 G. Sagittarii	E	...	18 30 30.0	2 0.4	48.30	47.50	...	278 31 13.42	+ 1.53	- 6.36	+1 46.63	-23 35 3.51
		W	...	18 34 29.0	1 58.6	55.50	51.50	...	153 33 49.38	+ 5.61	+ 6.17	-1 46.64	
12	30 Sagittarii	W	...	18 42 1.0	2 53.4	53.60	51.15	...	154 52 30.40	+ 5.00	+13.47	-1 41.02	-22 16 9.37
		E	...	18 48 2.0	3 7.6	46.50	47.25	...	277 12 34.10	+ 0.92	-15.77	+1 41.02	
13	ζ Sagittarii	E	...	18 53 28.0	2 52.4	47.95	47.30	...	284 56 33.80	+ 1.40	-11.70	+2 23.61	-30 0 56.96
		W	...	18 59 30.0	3 9.6	55.00	51.25	...	147 8 23.48	+ 5.50	+14.15	-2 23.61	
14	21 Aquilæ	W	...	19 5 51.0	2 51.6	52.55	50.25	...	179 15 38.22	+ 4.12	+20.85	- 41.76	+ 2 8 4.58
		E	...	19 11 49.0	3 6.4	47.10	47.00	...	252 49 27.90	+ 0.89	-24.60	+ 41.76	
15	186 G. Sagittarii	E	...	19 17 48.0	2 54.7	48.05	47.70	...	284 51 30.80	+ 1.51	-12.03	+2 23.19	-29 55 51.66
		W	...	19 23 48.0	3 5.3	55.00	51.55	...	147 13 30.60	+ 5.51	+13.54	-2 23.19	
16	ϵ Sagittæ	W	...	19 29 54.0	2 53.3	53.15	50.80	...	193 22 9.58	+ 4.73	+31.73	- 23.37	+16 15 4.38
		E	...	19 35 53.0	3 5.7	47.90	47.40	...	238 42 59.28	+ 1.39	-36.44	+ 23.37	
17	August 18, H. ξ Sagittarii	E	...	18 49 1.0	2 49.1	49.55	51.25	...	276 10 12.88	+ 2.31	-13.04	+1 36.30	-21 13 48.06
		W	...	18 54 53.0	3 2.9	54.95	53.85	...	155 54 44.50	+ 5.21	+15.25	-1 36.30	

Time	Ther. 1902.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>					<i>° ' "</i>	<i>"</i>
19 15 61	75.2	...	...				1	216 2 33.80	+ 1.04
16 2	74.8	77.0	29.042				2	33.11	+ 0.27
16 25	73.9	...	...				3	32.86	+ 1.86
16 37	...	76.0	29.058				4	31.92	- 3.17
17 11	73.2	...	...				5	33.34	+ 22.29
17 18	...	75.0	29.058				6	34.29	- 6.14
17 19 57	69.4	...	29.886				7	33.61	...
17 19	69.0	...	...				8	33.22	-20.97
17 22	...	71.5	29.886*				9	34.15	...
17 31	69.0	...	...				10	33.99	...
17 45	68.8	...	...				11	34.87	-11.60
18 1	68.9	...	...				12	34.06	-13.00
18 7	...	73.0	29.886				13	33.12	...
18 13	68.6	...	...				14	33.69	-19.82
18 19	68.1	...	...				15	34.06	-14.05
18 19	...	70.5	29.864				16	35.14	-22.79
18 25	67.9	...	...				17	33.60	-13.75
18 26	67.7	...	...				
19 9	67.2	70.0	29.892						
19 24	67.0	...	...				
19 33	66.9	69.0	29.891						
18 18 43	...	72.5	29.870						
18 52	70.4	...	...				

Note.
* Barometer reading changed from 29.836 to 29.886 in.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	55 Draconis	W	...	19 6 26.0	2 51.3	53.20	53.05	.....	242 56 20.02	+ 4.29	-11.27	+ 28.17	+65 49 24.44
		E	...	19 12 26.0	3 8.7	47.90	49.95	.....	189 8 39.35	+ 1.15	+13.68	- 28.17	
2	6 Vulpeculæ	E	...	19 21 33.0	3 0.2	49.00	50.45	.....	230 29 54.80	+ 1.68	-50.25	+ 14.33	+24 28 30.42
		W	...	19 27 37.0	3 3.8	54.65	53.50	.....	201 35 4.85	+ 4.93	+52.28	- 14.33	
3	<i>e</i> Sagittarii	W	...	19 33 59.0	2 52.8	53.00	52.65	.....	160 47 30.70	+ 3.99	+14.79	-1 19.94	-16 20 47.18
		E	...	19 39 58.0	3 6.2	47.35	49.55	.....	271 17 34.10	+ 0.75	-17.18	+1 19.92	
4	<i>ε</i> Draconis	E	...	19 45 32.0	2 52.4	48.25	50.25	.....	184 56 33.95	+ 1.41	+ 8.34	- 33.53	+70 1 39.94
		W	...	19 51 30.0	3 5.6	54.50	53.60	.....	247 8 27.55	+ 4.96	- 9.66	+ 33.53	
5	66 Aquilæ	W	...	20 5 11.0	2 55.8	53.95	53.45	.....	175 50 0.55	+ 4.74	+20.31	- 46.99	- 1 17 39.28
		E	...	20 11 10.0	3 3.2	48.00	49.60	.....	256 15 4.90	+ 0.99	-22.05	+ 47.00	
6	69 Aquilæ	E	...	20 21 30.0	2 58.3	49.05	50.20	.....	258 9 26.62	+ 1.60	-20.08	+ 50.27	- 3 12 6.70
		W	...	20 28 46.0	4 17.7	54.95	53.95	.....	173 55 14.45	+ 5.22	+41.95	- 50.28	
7	August 20, H. <i>d</i> Ophiuchi	E	...	17 18 8.0	2 55.3	39.20	39.85	.....	284 42 21.50	+ 0.55	-12.15	+2 19.71	-29 46 39.64
		W	...	17 24 9.0	3 5.7	42.10	41.85	.....	147 22 40.32	+ 2.41	+13.63	-2 19.72	
8	<i>o</i> Serpentis	W	...	17 33 1.0	2 50.2	45.50	47.90	.....	164 18 53.25	+ 6.37	+15.26	-1 9.56	-12 49 13.83
		E	...	17 38 53.0	3 1.8	41.35	44.85	.....	267 46 10.90	+ 3.61	-17.41	+1 9.56	
9	<i>z</i> Herculis	E	...	17 45 15.0	2 8.6	41.60	45.10	.....	206 31 52.22	+ 3.83	+28.20	- 9.22	+48 25 38.05
		W	...	17 50 14.0	2 50.4	47.45	48.90	.....	225 33 30.35	+ 7.46	-49.58	+ 9.22	
10	<i>τ</i> Ophiuchi (<i>mean</i>)	W	...	17 54 53.0	2 48.6	46.65	48.55	.....	168 57 20.58	+ 7.05	+16.30	- 59.09	- 8 10 34.90
		E	...	18 0 48.0	3 6.4	40.70	44.80	.....	263 7 45.72	+ 3.41	-19.92	+ 59.10	
11	Groombridge 1004 S. P.	E	...	18 6 39.0	2 38.7	42.10	45.45	.....	161 44 17.38	+ 4.13	- 0.74	-1 16.49	+86 45 9.58
		W	...	18 12 23.0	3 5.3	47.70	49.65	.....	270 20 46.05	+ 7.89	+ 1.01	+1 16.49	
12	<i>χ</i> Draconis	W	...	18 20 7.0	2 34.1	47.65	49.35	.....	249 48 34.22	+ 7.73	- 5.39	+ 36.86	+72 41 52.78
		E	...	18 25 42.0	3 0.9	40.85	44.20	.....	182 16 27.82	+ 3.15	+ 7.43	- 36.86	
13	4 H. Scuti	E	...	18 33 53.0	2 58.4	42.00	45.50	.....	264 5 33.40	+ 4.14	-17.92	+1 1.41	- 9 8 28.20
		W	...	18 40 0.0	3 8.6	48.05	49.05	.....	167 59 24.60	+ 7.72	+20.03	-1 1.41	
14	21 Aquilæ	E	...	19 5 50.0	2 52.8	42.55	45.75	.....	252 49 25.08	+ 4.44	-21.14	+ 41.32	+ 2 8 3.81
		W	...	19 11 47.0	3 4.2	48.05	49.40	.....	179 15 33.05	+ 7.89	+24.03	- 41.33	
15	<i>b</i> Aquilæ	W	...	19 17 21.0	2 53.3	46.30	47.90	.....	188 51 49.20	+ 6.63	+27.32	- 28.41	+11 44 33.91
		E	...	19 23 33.0	3 18.7	40.75	44.55	.....	243 13 24.75	+ 3.30	-35.90	+ 28.42	
16	<i>σ</i> Aquilæ	E	...	19 31 31.0	2 47.1	42.00	45.30	.....	249 46 37.28	+ 4.03	-21.25	+ 36.96	+ 5 10 56.71
		W	...	19 37 27.0	3 8.9	47.05	48.55	.....	182 18 19.45	+ 7.15	+27.15	- 36.96	
17	<i>φ</i> Aquilæ	W	...	19 48 33.0	2 59.3	45.00	47.15	.....	188 17 34.50	+ 5.86	+28.75	- 29.23	+11 10 19.95
		E	...	19 54 40.0	3 7.7	39.65	43.95	.....	243 47 33.22	+ 2.67	-31.49	+ 29.23	
18	August 21, H. 30 Ophiuchi	E	...	16 52 59.0	2 50.7	43.15	46.95	.....	259 1 45.00	+ 0.69	-18.09	+ 51.48	- 4 4 28.73
		W	...	16 58 54.0	3 4.3	54.10	54.10	.....	173 3 10.78	+ 7.58	+21.09	- 51.48	

Time.	Ther. 3882.	Atm. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				<i>° ' "</i>	<i>"</i>
18 19 9	70.0	...	...			1	216 2 33.61	-25.78
19 17	...	72.0	29.872			2	34.14	...
19 25	69.8	...	...			3	33.56	-17.88
19 37	69.7	...	...			4	33.28	...
19 49	69.4	...	...			5	34.72	-21.70
19 55	...	71.0	29.862			6	34.87	-22.00
20 8	69.0	...	...			7	33.12	...
20 25	68.9	...	...			8	35.09	-10.37
20 34	...	70.5	29.868			9	36.24	-24.91
20 17 9	71.8	75.0	29.682			10	36.58	-13.36
17 21	71.8	...	...			11	37.86	+24.40
17 36	71.8	...	...			12	37.48	...
17 48	71.8	74.5	29.680	6	Clouds.	13	35.08	...
17 48	71.8	...	...	6 E, 11 E.	One microscope reading increased 10".	14	36.67	-20.05
18 10	71.5	...	...	7.	Poor.	15	37.66	...
18 21	70.8	73.5	29.706	12 E.	One level reading decreased 10 div.	16	36.90	-21.61
18 36	69.9	...	...	13 W.	Clock time increased 1m.	17	36.76	-22.99
19 2	...	72.5	29.728	15 E.	One level reading increased 10 div.	18	33.52	...
19 9	69.8	...	...	17 W.	One level reading increased 2 div.			
19 20	69.8	...	...			
19 34	69.6	...	...			
19 52	68.2	71.0	29.780					
21 16 46	...	75.0	29.872					
16 56	72.3	...	...			

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	139 G. Scorpii	W	...	17 7 45.0	2 53.7	50.30	51.05	...	144 36 32.70	+ 5.00	+ 11.38	-2 43.33	-32 33 8.28
		E	...	17 13 43.0	3 4.3	44.15	47.05	...	287 28 24.28	+ 1.18	- 12.81	+2 43.32	
2	σ Ophiuchi	E	...	17 18 40.0	2 55.0	44.70	47.80	...	250 43 49.08	+ 1.50	- 22.77	+ 38.40	+ 4 13 43.51
		W	...	17 24 38.0	3 3.0	52.00	51.90	...	181 21 7.28	+ 5.87	+ 24.90	- 38.40	
3	X Sagittarii	W	...	17 38 26.0	2 54.9	46.15	48.45	...	149 21 38.12	+ 2.36	+ 12.50	-2 8.20	-27 47 31.42
		E	...	17 44 27.0	3 6.1	46.45	49.00	...	282 43 24.50	+ 2.74	- 14.15	+2 8.19	
4	89 Herculis	E	...	17 48 53.0	2 30.2	47.00	49.10	...	228 53 55.25	+ 2.91	- 38.65	+ 12.70	+26 4 17.18
		W	...	17 54 32.0	3 8.8	47.70	49.10	...	203 10 41.35	+ 3.23	+ 1.04	- 12.71	
5	102 Herculis	W	...	18 1 35.0	2 54.5	45.80	48.10	...	197 55 10.52	+ 2.13	+ 38.84	- 18.22	+20 48 18.23
		E	...	18 7 30.0	3 0.5	45.95	48.40	...	234 9 51.55	+ 2.25	- 41.56	+ 18.22	
6	δ Sagittarii	E	...	18 11 47.0	2 54.0	46.30	48.70	...	284 47 37.58	+ 2.53	- 11.95	+2 22.07	-29 52 1.69
		W	...	18 17 47.0	3 6.0	47.95	49.50	...	147 17 18.15	+ 3.40	+ 13.66	-2 22.08	
7	29 H ¹ Sagittarii	W	...	18 30 7.0	2 53.2	45.70	48.05	...	156 0 53.78	+ 2.09	+ 13.70	-1 36.34	-21 7 43.25
		E	...	18 36 13.0	3 12.8	45.80	48.05	...	276 4 11.82	+ 2.20	- 16.98	+1 36.34	
8	204 B. Draconis	E	...	18 41 34.0	2 52.1	46.70	48.90	...	202 4 10.02	+ 2.88	+ 31.40	- 13.88	+52 53 19.15
		W	...	18 47 33.0	3 6.9	47.95	49.40	...	230 0 54.78	+ 3.44	- 37.04	+ 13.88	
9	τ Sagittarii	W	...	18 57 41.0	3 6.1	46.55	48.40	...	149 20 38.15	+ 2.56	+ 14.15	-2 8.80	-27 48 30.87
		E	...	19 3 43.0	2 55.9	45.15	47.55	...	282 44 23.55	+ 1.74	- 12.64	+2 8.80	
10	22 Aquilæ	E	...	19 8 43.0	2 53.4	45.70	48.00	...	250 17 22.50	+ 2.03	- 22.59	+ 38.01	+ 4 40 9.45
		W	...	19 14 43.0	3 6.6	47.40	48.80	...	181 47 34.12	+ 2.92	+ 26.16	- 38.02	
11	5 Vulpeculæ	W	...	19 19 8.0	2 44.4	46.60	48.60	...	197 1 40.45	+ 2.56	+ 33.10	- 19.25	+19 54 41.52
	August 23, H.	E	...	19 25 3.0	3 10.6	45.50	47.45	...	235 3 31.02	+ 1.69	- 44.48	+ 19.25	
12	139 G. Scorpii	E	...	17 7 48.0	2 51.1	51.10	50.90	...	287 28 24.88	+ 1.72	- 11.04	+2 39.76	-32 33 8.45
		W	...	17 13 44.0	3 4.9	52.90	51.70	...	144 36 29.00	+ 2.65	+ 12.90	-2 39.78	
13	d Ophiuchi	W	...	17 18 12.0	2 51.6	51.65	51.20	...	147 22 38.30	+ 2.02	+ 11.64	-2 17.96	-29 46 41.33
		E	...	17 24 14.0	3 10.4	49.20	49.95	...	284 42 26.00	+ 0.68	- 14.33	+2 17.97	
14	α Serpentis	E	...	17 33 1.0	2 50.5	50.95	50.45	...	267 46 6.80	+ 1.47	- 15.32	+1 8.74	-12 49 15.03
		W	...	17 38 58.0	3 6.5	54.00	51.85	...	164 18 45.32	+ 3.05	+ 18.33	-1 8.74	
15	ϵ Herculis	W	...	17 44 41.0	2 42.9	52.50	50.85	...	225 33 24.12	+ 2.08	- 45.24	+ 9.11	+48 25 36.99
		E	...	17 50 31.0	3 7.1	49.45	49.65	...	206 31 18.70	+ 0.56	+ 59.61	-9.12	
16	Ophiuchi (mean)	E	...	17 54 50.0	2 51.8	50.10	50.05	...	263 7 40.40	+ 0.94	- 16.92	+ 58.39	- 8 10 35.64
		W	...	18 1 41.0	3 59.2	52.95	51.55	...	168 57 0.92	+ 2.57	+ 32.80	- 58.42	
17	446 B. Herculis	W	...	18 14 56.0	3 3.3	51.95	51.15	...	200 21 10.12	+ 2.06	+ 48.44	- 15.30	+23 14 30.60
	August 24, H.	E	...	18 20 51.0	2 51.7	49.25	49.80	...	231 43 44.45	+ 0.55	- 42.52	+ 15.30	
18	139 G. Scorpii	E	...	17 7 45.0	2 54.0	51.40	50.90	...	287 28 25.90	+ 2.93	+ 11.42	+2 38.65	-32 33 8.03
		W	...	17 13 42.0	3 3.0	53.35	51.60	...	144 36 28.48	+ 3.86	+ 12.63	-2 38.62	
19	σ Ophiuchi	W	...	17 18 42.0	2 53.3	51.45	50.80	...	181 21 10.95	+ 2.86	+ 22.33	- 37.31	+ 4 13 42.86
		E	...	17 24 46.0	3 10.7	50.45	50.10	...	250 43 54.32	+ 2.17	- 27.03	+ 37.31	

Time.	Ther 1882.	Att. ther	Barom	Observation made at V with fixed thread, except as noted below.							No	Zenith point.	Red. to 1903.0.
<i>a h m</i>			<i>in</i>										
17 11	71.9										1	216.2 10.86	- 1.88
17 22	70.3	73.0	29.870								2	12.98	
17 41	69.4										3	13.03	- 6.07
17 52	69.0	71.5	29.864								4	12.56	
18 5	68.9										5	31.86	-21.22
18 15	68.8	71.0	29.864								6	31.71	
18 33	68.9										7	13.30	-12.23
18 45	68.0	70.5	29.858								8	12.74	-26.45
19 1	67.1										9	33.76	-12.67
19 12	67.0										10	12.56	-20.74
19 22	67.0										11	32.17	-23.64
19 29		69.5	29.858								12	30.04	- 1.79
19 56		70.5	29.752								13	12.16	
17 11	80.1										14	29.82	-10.34
17 21	79.4										15	29.91	-25.26
17 35		81.0	29.752								16	30.34	-14.46
17 46	79.1										17	31.55	-22.47
17 48	78.9										18	31.20	- 1.78
17 58	78.8	80.5	29.750								19	32.80	
18 18	77.9												
18 25		80.6	29.761										
18 32	81.5	80.0	29.756										
18 39	81.7												

Notes

6. Unsteady
12 W. One microscope reading decreased 16"
14 W. One microscope reading decreased 20"

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	158 H ¹ . Cephei s. p.	E W	...	17 28 45.0 17 34 24.0	2 4.1 3 34.9	50.75 52.10	50.10 51.05	..... .....	160 7 39.78 271 57 16.28	+ 2.28 + 3.17	- 0.67 + 2.00	-1 19.58 +1 19.58	+85 8 33.56
2	X Sagittarii	W E	...	17 38 27.0 17 44 28.0	2 54.2 3 6.2	52.25 49.40	51.15 49.60	..... .....	149 21 33.55 282 43 30.02	+ 3.25 + 1.63	+12.40 -14.26	-2 4.63 +2 4.65	-27 47 31.91
3	70 Ophiuchi (mean)	E W	...	17 57 35.0 18 3 30.0	2 51.6 3 3.4	50.05 52.45	49.75 50.75	..... .....	252 25 53.20 179 39 3.25	+ 1.88 + 3.16	-21.04 +24.03	+ 39.83 - 39.83	+ 2 31 35.20
4	447 B. Herculis	W E	...	18 15 27.0 18 21 32.0	2 58.1 3 6.9	51.30 50.00	50.60 49.40	..... .....	194 54 0.28 237 11 6.10	+ 2.79 + 1.73	+35.54 -30.12	- 20.89 + 20.89	+17 47 0.89
5	84 G. Sagittarii	E W	...	18 29 34.0 18 35 29.0	2 56.8 2 58.2	49.00 52.30	49.15 51.10	..... .....	278 31 22.78 153 33 37.52	+ 1.30 + 3.23	-13.71 +13.93	+1 43.40 -1 43.37	-23 35 4.40
6	204 B. Draconis	W E	...	18 41 32.0 18 47 39.0	2 54.3 3 12.7	51.15 48.05	50.60 48.90	..... .....	230 0 50.80 202 4 3.28	+ 2.69 + 0.96	-32.22 +39.38	+ 13.49 - 13.49	+52 53 19.15
7	ζ Sagittarii	E W	...	18 53 26.0 18 59 27.0	2 54.7 3 6.3	48.60 52.35	48.90 50.40	..... .....	284 56 36.72 147 8 21.58	+ 1.10 + 3.00	-12.02 +13.67	+2 19.41 -2 19.40	-30 0 56.35
8	55 Draconis	W E	...	19 6 26.0 19 12 24.0	2 51.6 3 6.4	50.65 47.65	50.10 48.50	..... .....	242 56 22.22 189 8 36.25	+ 2.32 + 0.61	-11.31 +13.34	+ 27.51 - 27.51	+65 49 25.85
9	21 B. Vulpeculæ	E W	...	19 18 27.0 19 24 23.0	2 51.5 3 4.5	48.20 52.40	48.60 50.70	..... .....	230 13 41.70 201 51 12.05	+ 0.76 + 3.11	-46.25 +53.53	+ 13.72 - 13.72	+24 44 39.35
10	ε Sagittæ	W E	...	19 30 4.0 19 35 54.0	2 43.6 3 6.4	51.55 48.15	50.60 48.50	..... .....	193 22 13.52 238 42 58.35	+ 2.85 + 0.74	+28.28 -36.71	- 22.69 + 22.70	+16 15 5.27
11	ζ Sagittæ	E W	...	19 41 37.0 19 47 41.0	2 57.1 3 6.9	48.20 52.05	49.25 50.95	..... .....	236 3 45.18 196 1 10.45	+ 1.07 + 3.12	-36.78 +40.95	+ 19.81 - 19.81	+18 54 19.55
12	September 14, H. 24 Ursæ Minoris	E W	...	18 3 59.0 18 9 48.0	2 32.3 3 16.7	47.60 50.70	49.85 51.95	..... .....	167 58 40.30 264 6 21.18	+ 3.56 + 5.27	+ 0.69 - 1.15	-1 1.04 +1 1.05	+87 0 8.20
13	447 B. Herculis	W E	...	18 15 40.0 18 21 33.0	2 56.1 2 56.9	50.60 46.25	51.85 48.90	..... .....	194 54 2.80 237 11 1.92	+ 5.00 + 2.74	+34.75 -35.06	- 21.27 + 21.27	+17 47 1.98
14	ξ Sagittarii	W E	...	18 49 7.0 18 55 2.0	2 54.8 3 0.2	49.60 43.90	50.40 47.55	..... .....	155 54 45.10 276 10 20.35	+ 4.36 + 1.01	+13.93 -14.80	-1 35.65 +1 35.65	-21 13 50.46
15	21 Aquilæ	E W	...	19 5 50.0 19 11 46.0	3 4.1 2 51.9	45.55 51.50	48.35 52.15	..... .....	252 49 26.58 179 15 38.00	+ 2.46 + 6.22	-24.00 +20.93	+ 41.18 - 41.18	+ 2 8 5.66
16	5 Vulpeculæ	W E	...	19 20 5.0 19 24 59.0	1 58.8 2 55.2	49.95 44.45	51.10 47.90	..... .....	197 1 58.95 235 3 25.48	+ 5.41 + 1.89	+17.29 -37.59	- 19.02 + 19.03	+19 54 43.69
17	54 Sagittarii	E W	...	19 33 12.0 19 37 27.0	2 3.3 2 11.7	45.30 52.00	48.15 52.55	..... .....	271 27 15.20 160 37 45.70	+ 2.19 + 6.63	- 7.51 + 8.57	+1 19.92 -1 19.92	-16 30 37.63
18	Groombridge 3402	W E	...	19 49 23.0 19 58 18.0	7 8.5 1 46.5	50.65 45.00	51.55 47.45	..... .....	265 56 42.18 166 8 22.78	+ 5.21 + 1.33	- 2.06 + 0.13	+1 5.58 -1 5.58	+88 50 32.90
19	66 Aquilæ	E W	...	20 5 4.0 20 11 10.9	3 14.5 2 51.5	44.25 51.65	47.45 51.95	..... .....	256 15 5.72 175 50 3.50	+ 1.45 + 5.39	-24.85 +19.32	+ 46.75 - 46.74	- 1 17 37.02
20	296 G. Sagittarii	W E	...	20 16 21.0 20 22 15.0	3 15.1 2 38.9	50.35 44.10	51.50 47.75	..... .....	148 10 49.12 283 54 10.20	+ 5.15 + 1.08	+15.25 -10.12	-2 15.10 +2 15.10	-28 58 24.14

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>in.</i>								
24 17 32	82.8	85.0	29.776						1	216 2 31.42	.....
17 41	82.1	.....	.....						2	33.30	5.93
18 1	82.1	.....	.....						3	32.24	.....
18 18	82.7	.....	.....						4	33.66	21.46
18 32	82.0	84.0	29.788						5	32.54	11.36
18 45	81.1	.....	.....						6	32.44	27.02
18 56	80.9	83.0	29.790						7	32.03	.....
19 9	80.9	.....	.....						8	31.72	27.16
19 21	80.4	82.5	29.790						9	32.45	24.70
19 33	80.0	.....	.....						10	33.52	23.71
19 45	79.8	.....	.....						11	32.00	23.32
19 52	.....	81.5	29.794						12	34.93	-28.04
14 17 59	.....	80.0	29.988						13	36.08	24.17
18 7	77.8	.....	.....						14	34.98	14.15
18 19	77.0	.....	.....						15	35.10	-21.49
18 52	75.8	.....	.....						16	35.72	26.59
19 0	.....	78.5	29.986						17	35.39	.....
19 9	75.8	.....	.....						18	34.78	20.82
19 23	75.0	.....	.....						19	35.27	-23.16
19 35	74.7	77.0	29.986						20	35.34	-16.37
19 54	74.1	.....	.....						
20 8	73.8	.....	.....						
20 19	73.7	.....	.....						

Note.

8 W. One microscope reading decreased to "

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Delphini	E	...	20 27 47.0	3 4.6	44.90	48.05	...	240 37 8.72	+ 1.96	-33.69	+ 25.33	+14 20 49.57
		W	...	20 33 46.0	2 54.4	51.95	52.05	...	191 27 56.70	+ 6.46	+30.07	- 25.33	
2	September 15, H. 156 H ¹ . Draconis	E	...	18 31 25.0	3 3.3	43.95	48.15	...	177 20 45.38	+ 1.80	+ 4.96	- 43.79	+77 28 48.90
		W	...	18 37 26.0	2 57.7	49.25	52.05	...	254 35 28.20	+ 5.35	- 4.66	+ 43.79	
3	30 Sagittarii	W	...	18 42 58.0	2 7.7	48.95	51.55	...	154 52 41.05	+ 4.86	+ 7.31	-1 39.61	-22 16 10.74
		E	...	18 48 1.0	2 55.3	43.25	48.00	...	277 12 41.38	+ 1.40	-13.77	+1 39.63	
4	5 Sagittarii	E	...	18 53 27.0	3 4.7	44.40	48.80	...	284 56 42.50	+ 2.14	-13.43	+2 21.66	-30 0 57.07
		W	...	18 59 28.0	2 56.3	50.05	51.85	...	147 8 29.28	+ 5.31	+12.24	-2 21.66	
5	6 Sagittarii	W	...	19 6 37.0	3 3.8	48.50	51.10	...	151 43 46.28	+ 4.73	+14.36	-1 54.05	-25 25 12.74
		E	...	19 12 38.0	2 57.2	43.15	47.65	...	280 21 28.30	+ 1.35	-13.35	+1 54.05	
6	b Aquilæ	E	...	19 17 21.0	3 4.5	43.95	48.00	...	243 13 22.55	+ 1.76	-30.96	+ 28.30	+11 44 35.83
		W	...	19 22 27.0	2 1.5	49.35	50.95	...	188 52 10.02	+ 4.60	+13.43	- 28.30	
7	228 G. Sagittarii	W	...	19 36 58.0	2 57.4	48.50	50.70	...	145 1 25.35	+ 4.46	+11.95	-2 38.81	-32 8 21.22
		E	...	19 42 50.0	2 54.6	43.05	47.45	...	287 3 50.42	+ 1.31	-11.58	+2 38.81	
8	g Sagittarii	E	...	19 49 30.0	3 2.2	43.90	47.95	...	270 41 32.82	+ 1.75	-16.62	+1 17.62	-15 44 37.26
		W	...	19 55 30.0	2 57.8	49.90	51.75	...	161 23 43.78	+ 5.47	+15.83	-1 17.60	
9	4 B. Ursæ Minoris s. p.	W	...	19 59 49.0	1 21.6	48.80	51.00	...	268 11 8.25	+ 4.65	+ 0.07	+1 10.87	+88 55 0.38
		E	...	20 4 10.0	2 59.4	42.95	47.15	...	163 54 8.58	+ 0.79	- 0.33	-1 10.87	
10	4 Capricorni	E	...	20 9 20.0	2 55.9	42.85	47.10	...	277 2 48.18	+ 0.86	-13.91	+1 39.28	-22 6 16.57
		W	...	20 15 18.0	2 53.1	50.10	51.70	...	155 2 28.28	+ 5.25	+13.46	-1 39.28	
11	69 Aquilæ	W	...	20 21 37.0	3 3.0	49.15	51.30	...	173 55 43.95	+ 5.02	+21.15	- 49.94	- 3 12 4.34
		E	...	20 27 31.0	2 51.0	43.00	46.90	...	258 9 29.98	+ 0.96	-18.47	+ 49.94	
12	29 Vulpeculæ	E	...	20 31 18.0	2 58.3	42.60	46.85	...	234 6 13.48	+ 0.54	-40.66	+ 18.05	+20 52 5.40
		W	...	20 37 14.0	2 57.7	49.50	51.55	...	197 59 1.22	+ 5.10	+40.39	- 18.05	
13	19 Capricorni	W	...	20 46 21.0	3 3.4	48.50	50.85	...	158 51 23.28	+ 4.54	+16.12	-1 25.64	-18 17 6.12
		E	...	20 52 19.0	2 54.6	43.00	47.15	...	273 13 51.92	+ 1.16	-14.62	+1 25.64	
14	September 16, H. δ Sagittarii	E	...	18 11 47.0	3 5.1	53.55	55.50	...	284 47 52.35	+ 1.37	-13.52	+2 19.36	-29 52 3.10
		W	...	18 17 44.0	2 51.9	58.25	58.90	...	147 17 23.22	+ 4.30	+11.66	-2 19.36	
15	c Serpentis	W	...	18 21 32.0	3 10.7	58.45	58.70	...	175 5 7.32	+ 4.17	+23.52	- 47.38	- 2 2 36.23
		E	...	18 27 47.0	3 4.3	53.15	54.60	...	257 0 8.00	+ 0.23	-21.97	+ 47.38	
16	156 H ¹ . Draconis	E	...	18 32 26.0	2 2.2	53.45	55.45	...	177 29 49.75	+ 1.30	+ 2.20	- 43.50	+77 28 47.35
		W	...	18 37 5.0	2 36.8	59.55	59.55	...	254 35 25.98	+ 5.03	- 3.03	+ 43.52	
17	55 Draconis	W	...	19 6 23.0	3 4.9	48.05	51.30	...	242 56 32.52	+ 4.46	-13.13	+ 27.79	+65 49 29.83
		E	...	19 12 34.0	3 6.1	42.60	46.90	...	189 8 39.32	+ 0.69	+13.30	- 27.79	
18	b Aquilæ	E	...	19 17 23.0	3 2.4	42.55	46.95	...	243 13 22.75	+ 0.94	-30.26	+ 28.15	+11 44 36.05
		W	...	19 23 22.0	2 56.6	49.40	51.10	...	188 51 55.88	+ 5.23	+28.37	- 28.15	

Time	Ther- 1902	Att ther	Barom.	Observation made at V with fixed thread, except as noted below.					No	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>in</i>							<i>° ' "</i>	<i>"</i>
14 20 31	73.5		29.988						1	216 2 35.11	-27.11
20 39	73.5		29.988						2	40.56	-30.30
15 18 22	73.5		29.946						3	41.12	-12.30
18 14	76.4								4	39.02	
18 47	76.9								5	40.84	
18 46	76.6								6	40.70	
19 10	75.2		29.954						7	40.96	-12.81
19 26	75.1		29.954						8	41.02	-18.54
19 40	74.8		29.948						9	41.00	
19 52	74.7								10	41.02	-17.80
20 7	74.6								11	41.30	-23.41
20 12	74.3								12	40.04	-28.48
20 25	74.8		29.948						13	41.30	-20.62
20 34	74.0								14	39.69	
20 49	73.8								15	40.04	-17.74
20 56			29.948						16	40.12	-30.28
20 58 5			29.946						17	18.58	-31.71
18 15	78.2								18	41.46	
18 24	77.9										
18 37	77.9										
19 9	76.7		29.846								
19 26	76.0										
19 30			29.844								

Note
6 W, 14 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	Sept. 18, H. 446 B. Herculis	E	...	18 15 11.0	2 59.0	50.25	48.50	.....	231 43 51.58	+ 2.44	- 46.21	+ 16.06	+23 14 33.37
		W	...	18 21 8.0	2 58.0	50.60	48.40	.....	200 21 25.00	+ 2.44	+ 45.70	- 16.06	
2	29 H ¹ . Sagittarii	W	...	18 30 4.0	3 7.3	49.15	47.75	.....	156 0 59.88	+ 1.62	+ 16.03	- 1 38.87	-21 7 44.77
		E	...	18 35 57.0	2 45.7	48.50	47.85	.....	276 4 14.08	+ 1.35	- 12.55	+ 1 38.87	
3	III Herculis	E	...	18 40 18.0	2 30.5	49.00	48.05	.....	236 53 9.40	+ 1.74	- 25.68	+ 21.80	+18 4 48.91
		W	...	18 45 37.0	2 48.5	50.50	48.50	.....	195 11 58.62	+ 2.54	+ 32.19	- 21.80	
4	ζ Sagittarii	W	...	18 53 27.0	3 4.6	50.45	48.60	.....	147 8 35.70	+ 2.36	+ 13.42	- 2 27.32	-30 0 58.93
		E	...	18 59 34.0	3 2.4	48.45	47.90	.....	284 56 39.92	+ 1.43	- 13.10	+ 2 27.32	
5	ζ Sagittæ	E	...	19 41 42.0	3 3.1	49.15	48.15	.....	236 3 51.30	+ 1.93	- 39.31	+ 20.93	+18 54 21.46
		W	...	19 47 42.0	2 56.9	51.85	49.30	.....	196 1 25.20	+ 3.26	+ 36.70	- 20.93	
6	63 Sagittarii	W	...	19 53 31.0	3 6.7	50.85	48.00	.....	163 14 16.38	+ 2.16	+ 18.02	- 1 15.65	-13 54 2.27
		E	...	19 59 31.0	2 53.3	47.70	47.05	.....	268 50 58.02	+ 0.84	- 15.52	+ 1 15.65	
7	20 Vulpeculæ	E	...	20 3 49.0	4 12.4	48.40	47.15	.....	228 47 43.02	+ 1.06	- 1 50.08	+ 13.02	+26 11 48.84
		W	...	20 10 55.0	2 53.6	50.55	48.90	.....	203 18 29.55	+ 2.53	+ 52.07	- 13.00	
8	296 G. Sagittarii	W	...	20 16 25.0	3 10.9	50.95	48.85	.....	148 11 1.85	+ 3.18	+ 14.60	- 2 20.46	-28 58 24.60
		E	...	20 22 1.0	2 25.1	47.40	46.85	.....	283 54 9.38	+ 0.52	- 8.44	+ 2 20.45	
9	212 H ¹ . Draconis	E	...	20 27 26.0	3 5.4	48.55	47.75	.....	182 45 42.25	+ 1.54	+ 8.12	- 37.78	+72 12 42.22
		W	...	20 33 28.0	2 56.6	52.35	49.60	.....	249 19 31.05	+ 3.57	- 7.37	+ 37.78	
10	3 Aquarii	W	...	20 39 33.0	3 9.4	51.80	49.20	.....	171 45 18.82	+ 3.18	+ 21.70	- 56.15	- 5 22 35.13
		E	...	20 45 36.0	2 53.6	47.75	47.20	.....	260 19 52.40	+ 1.04	- 18.23	+ 56.14	
11	η Capricorni	E	...	20 55 55.0	3 3.5	49.05	47.80	.....	275 10 32.85	+ 1.55	- 15.62	+ 1 36.22	-20 13 58.49
		W	...	21 1 51.0	2 52.5	53.35	49.55	.....	156 54 43.15	+ 3.74	+ 13.80	- 1 36.22	
12	ι Capricorni	W	...	21 13 56.0	3 0.2	51.55	49.15	.....	159 54 0.20	+ 2.80	+ 15.85	- 1 25.77	-17 14 30.22
		E	...	21 19 50.0	2 53.8	47.55	46.80	.....	272 11 15.42	+ 0.70	- 14.74	+ 1 25.77	
13	Sept. 19, H. 447 B. Herculis	E	...	18 15 36.0	3 1.7	54.40	50.60	.....	237 11 3.98	+ 4.46	- 36.98	+ 22.15	+17 47 2.67
		W	...	18 21 31.0	2 53.3	51.05	48.10	.....	194 54 11.78	+ 2.15	+ 33.64	- 22.15	
14	6 H. Scuti	W	...	18 39 2.0	3 6.0	48.45	46.55	.....	172 17 9.80	+ 0.68	+ 21.15	- 54.86	- 4 50 46.95
		E	...	18 44 58.0	2 50.0	51.50	48.80	.....	259 48 4.40	+ 2.61	- 17.66	+ 54.86	
15	ξ Sagittarii	E	...	18 49 2.0	3 1.3	52.25	49.50	.....	276 10 18.22	+ 3.20	- 14.99	+ 1 39.53	-21 13 49.29
		W	...	18 55 4.0	3 0.7	51.00	47.80	.....	155 54 56.42	+ 2.05	+ 14.89	- 1 39.53	
16	τ Sagittarii	W	...	18 59 10.0	1 50.0	49.45	47.45	.....	149 20 57.12	+ 1.41	+ 4.94	- 2 12.47	-27 48 32.66
		E	...	19 4 8.0	3 8.0	51.75	49.00	.....	282 44 29.00	+ 2.82	- 14.44	+ 2 12.48	
17	ε Sagittarii	E	...	19 34 4.0	3 1.0	53.45	49.70	.....	271 17 33.00	+ 3.69	- 16.23	+ 1 22.64	-16 20 47.53
		W	...	19 39 56.0	2 51.1	51.45	48.00	.....	160 47 40.30	+ 2.35	+ 14.50	- 1 22.64	
18	ε Draconis	W	...	19 45 30.0	3 6.4	49.60	47.15	.....	247 8 42.15	+ 1.28	- 9.75	+ 34.64	+70 1 46.61
		E	...	19 51 27.0	2 50.6	51.65	48.60	.....	184 56 32.52	+ 2.61	+ 8.16	- 34.64	
19	4 B. Ursæ Minoris s.p.	E	...	19 58 20.0	2 57.2	52.65	49.00	.....	163 54 9.32	+ 3.07	- 0.32	- 1 13.80	+88 55 0.58
		W	...	20 4 19.0	3 1.8	50.40	47.90	.....	268 11 7.32	+ 1.93	+ 0.34	+ 1 13.80	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>								<i>° ' "</i>	<i>"</i>
18 18 1	...	61.5	30.054							1	216 2 40.48	-24.59
18 18 18	58.7	...	...							2	40.20	-11.74
18 33 58.5							3	39.40	-24.64
18 43 58.2							4	39.86	...
18 50 60.5	30.066							5	39.54	-27.17
18 57 58.0							6	39.95	-19.10
19 45 56.8	...	59.0	30.076							7	39.08	-29.10
19 57 56.2	...	58.5	30.080							8	40.54	-16.00
20 7 50.1							9	39.58	...
20 19 56.0							10	39.45	...
20 30 55.8							11	39.74	-20.15
20 43 55.4	...	58.0	30.080							12	40.16	...
20 59 54.7							13	39.52	-23.21
21 7 54.8							14	40.49	-17.82
21 24 57.0	30.082							15	39.90	-12.91
19 18 12	...	62.5	30.152							16	40.43	-11.77
18 19 59.5							17	38.80	-17.10
18 36 61.5	30.146							18	38.48	...
18 42 58.9							19	40.83	...
18 52 58.6									
19 2 58.1									
19 9 60.5	30.142									
19 37 57.7									
19 48 57.8	...	60.5	30.144									
20 1 57.1									

Notes.

4 E, 16 E. One microscope reading increased 10".
 5 W. One microscope reading decreased 10".
 12. Clock time increased 10".
 19 E. One level reading decreased 5 div.

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	4 Capricorni	W		20 10 15.0	2 11.4	50.05	47.40	.....	155 2 39.48	+ 1.54	+ 7.76	-1 43.40	-22 6 17.39
		E		20 16 18.0	3 51.6	51.95	48.65	.....	277 2 51.65	+ 2.74	-24.11	+1 43.42	
2	212 H ¹ . Draconis	E		20 27 29.0	3 4.0	53.80	49.70	.....	182 45 40.32	+ 3.89	+ 8.00	- 37.76	+72 12 41.4
		W		20 33 27.0	2 54.0	51.25	47.55	.....	249 19 31.05	+ 2.06	- 7.15	+ 37.77	
3	3 Aquarii	W		20 39 34.0	3 10.0	49.85	47.10	.....	171 45 20.80	+ 1.40	+21.84	- 56.06	- 5 22 34.99
		E		20 45 34.0	2 50.0	52.10	49.00	.....	260 19 49.90	+ 3.04	-17.48	+ 56.05	
4	θ Capricorni	E		20 57 35.0	3 1.6	53.95	49.90	.....	272 33 29.12	+ 4.02	-15.99	+1 26.82	-17 36 46.27
		W		21 3 25.0	2 48.4	51.50	47.60	.....	159 31 48.78	+ 2.18	+13.75	-1 26.82	
5	4 Piscis Australis	W		21 9 3.0	3 7.5	50.40	47.00	.....	144 35 33.92	+ 1.54	+13.26	-2 49.86	-32 34 22.57
		E		21 15 3.0	2 52.5	52.75	49.60	.....	287 29 35.40	+ 3.52	-11.22	+2 49.85	
6	September 20, H. χ Draconis	E		18 19 48.0	3 1.2	51.05	49.80	.....	182 16 27.32	+ 3.62	+ 7.45	- 37.99	+72 41 54.72
		W		18 25 55.0	3 5.8	49.00	47.65	.....	249 48 44.15	+ 2.02	- 7.84	+ 37.99	
7	29 H ¹ . Sagittarii	W		18 30 5.0	3 5.1	48.20	47.80	.....	156 0 58.88	+ 1.90	+15.65	-1 38.26	-21 7 44.33
		E		18 36 8.0	2 57.9	48.60	49.10	.....	276 4 14.08	+ 2.47	-14.46	+1 38.26	
8	30 Sagittarii	E		18 42 5.0	2 59.4	49.55	48.90	.....	277 12 34.40	+ 2.76	-14.42	+1 43.06	-22 16 10.54
		W		18 47 59.0	2 54.6	49.75	48.25	.....	154 52 38.10	+ 2.51	+13.66	-1 43.06	
9	τ Sagittarii	W		18 57 50.0	3 7.1	47.95	47.60	.....	149 20 45.35	+ 1.67	+14.31	-2 11.46	-27 48 32.46
		E		19 3 58.0	3 0.9	47.10	47.50	.....	282 44 28.90	+ 1.31	-13.37	+2 11.46	
10	22 Aquilæ	E		19 8 41.0	3 5.4	47.80	48.05	.....	250 17 29.58	+ 2.02	-25.82	+ 38.79	+ 4 40 11.72
		W		19 14 43.0	2 56.6	49.30	47.95	.....	181 47 47.35	+ 2.49	+23.43	- 38.78	
11	ε Aquilæ	W		19 22 32.0	3 7.1	47.90	47.45	.....	174 8 42.52	+ 1.58	+22.21	- 51.15	- 2 59 6.83
		E		19 28 37.0	2 57.9	47.25	47.35	.....	257 56 30.00	+ 1.27	-20.08	+ 51.15	
12	ε Sagittarii	E		19 33 58.0	3 4.1	47.85	47.35	.....	271 17 35.60	+ 1.71	-16.79	+1 22.06	-16 20 47.20
		W		19 39 58.0	2 55.9	49.00	48.35	.....	160 47 38.82	+ 2.56	+15.33	-1 22.06	
13	φ Aquilæ	W		19 48 41.0	3 1.2	47.65	47.10	.....	188 17 44.80	+ 1.56	+29.36	- 30.03	+11 10 23.78
		E		19 54 41.0	2 58.8	47.50	47.15	.....	243 47 28.75	+ 1.47	-28.59	+ 30.03	
14	ρ Aquilæ	E		20 6 46.0	3 5.0	48.20	47.40	.....	240 3 29.28	+ 1.82	-34.49	+ 25.46	+14 54 34.22
		W		20 12 45.0	2 54.0	48.95	47.65	.....	192 1 49.70	+ 2.25	+30.51	- 25.46	
15	ζ Delphini	W		20 27 46.0	3 4.2	48.25	47.60	.....	191 28 1.80	+ 1.61	+33.54	- 26.14	+14 20 49.16
		E		20 33 46.0	2 55.8	47.00	46.75	.....	240 37 9.38	+ 1.06	-30.56	+ 26.14	
16	ω Capricorni	E		20 43 2.0	3 4.3	47.20	46.65	.....	282 12 38.02	+ 0.95	-14.00	+2 8.72	-27 16 37.56
		W		20 49 6.0	2 59.7	49.60	48.15	.....	149 52 38.02	+ 2.42	+13.31	-2 8.70	
17	η Capricorni	W		20 55 59.0	2 58.3	48.95	47.65	.....	156 54 42.48	+ 2.00	+14.74	-1 35.41	-20 13 58.51
		E		21 2 3.0	3 5.7	46.20	46.60	.....	275 10 34.32	+ 0.61	-16.00	+1 35.42	
18	September 21, H. 2 H. Scuti	E		18 20 48.0	2 55.4	52.00	49.10	.....	269 34 20.00	+ 4.80	-15.70	+1 15.95	-14 37 27.18
		W		18 26 43.0	2 59.6	47.90	46.20	.....	162 30 54.40	+ 2.26	+16.47	-1 15.93	
19	φ Sagittarii	W		18 36 36.0	3 3.3	46.75	46.10	.....	150 3 57.68	+ 2.12	+13.89	-2 5.51	-27 5 15.17
		E		18 42 38.0	2 58.7	50.95	48.10	.....	282 1 15.52	+ 4.22	-13.21	+2 5.51	

Time.	Ther 3882	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903 0
d h m	°		mm				
19 20 13	57.1	60.5	10.139		1	216 2 39.54	-17.49
20 10	56.9				2	39.09	
20 43	57.3	60.0	10.150		3	39.74	
21 0	56.8				4	40.93	
21 12	56.9	59.5	10.153		5	38.20	
25 18 16		60.0	10.086		6	38.46	
18 23	61.9				7	39.36	-11.68
18 33	61.8				8	38.50	-12.06
18 40		64.5	10.076		9	39.08	-11.71
18 45	61.0				10	39.53	-22.42
18 1	60.8				11	38.75	-30.82
19 12	60.6	64.0	10.076		12	38.62	-17.26
19 26	60.7				13	38.68	-25.86
19 37	60.0				14	39.54	-27.72
19 45		62.5	10.076	8 E One microscope reading decreased 10"	15	38.42	-27.66
19 52	59.7			8 W Clock time decreased 10 ^m	16	39.47	-17.71
20 10	59.1			13 E Clock time increased 10 ^m	17	39.08	-26.18
20 19		61.5	10.074	16 E One microscope reading increased 10"	18	41.12	
20 31	59.1			18 E One level reading increased 10 div	19	40.11	
20 46	58.0						
20 59	58.7	61.0	10.074				
21 18 16		59.0	10.076				
18 24	60.4						
18 46	60.5						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	ε Sagittarii	E W	...	18 48 58.0 18 54 53.0	3 2.0 2 53.0	51.45 47.20	48.80 46.40	..... .....	276 10 19.45 155 54 56.25	+ 4.48 + 2.16	- 15.10 + 13.65	+1 37.64 -1 37.64	-21 13 49.26
2	25 H. Camelop. S.P.	W E	...	19 7 43.0 19 13 42.0	3 4.9 2 54.1	45.85 49.45	45.75 48.00	..... .....	274 30 19.38 157 34 56.48	+ 1.28 + 3.63	+ 2.20 - 1.95	+1 31.52 -1 31.52	+82 35 29.37
3	e Aquilæ	E W	...	19 22 36.0 19 27 35.0	3 2.7 1 56.3	50.20 47.40	48.30 46.50	..... .....	257 56 31.25 174 8 56.60	+ 3.90 + 2.27	- 21.17 + 8.58	+ 50.51 - 50.49	- 2 59 7.00
4	54 Sagittarii	W E	...	19 32 11.0 19 38 10.0	3 2.6 2 56.4	46.35 49.15	46.10 47.95	..... .....	160 37 48.12 271 27 26.55	+ 1.96 + 3.64	+ 16.47 - 15.37	-1 21.62 +1 21.62	-16 30 39.00
5	9 Sagittarii	E W	...	19 49 29.0 19 55 30.0	3 1.6 2 59.4	50.30 47.00	47.95 45.70	..... .....	270 41 28.38 161 23 48.78	+ 4.00 + 1.98	- 16.51 + 16.11	+1 19.32 -1 19.30	-15 44 37.05
6	20 Vulpeculæ	W E	...	20 4 52.0 20 10 56.0	3 7.9 2 56.1	45.05 49.15	44.85 47.65	..... .....	203 18 23.90 228 46 44.92	+ 0.62 + 3.31	+1 1.00 - 53.59	- 12.76 + 12.76	+26 11 49.44
7	296 G. Sagittarii	E W	...	20 16 20.0 20 22 10.0	3 14.4 2 35.6	48.40 46.45	47.50 45.80	..... .....	283 54 18.32 148 11 6.65	+ 2.90 + 1.69	- 15.14 + 9.70	+2 17.89 -2 17.87	-28 58 25.14
8	212 H ¹ . Draconis	W E	...	20 27 33.0 20 33 26.0	2 56.8 2 56.2	45.30 47.80	45.25 47.30	..... .....	249 19 35.68 182 45 41.95	+ 2.18 + 2.97	- 7.38 + 7.33	+ 37.07 - 37.07	+72 12 42.94
9	3 Aquarii	E W	...	20 39 42.0 20 45 40.0	2 58.8 2 59.2	49.00 46.65	47.35 45.50	..... .....	260 19 53.82 171 45 22.25	+ 3.41 + 1.67	- 19.34 + 19.43	+ 55.11 - 55.11	- 5 22 35.62
10	γ Microscopii	W E	...	20 52 23.0 20 58 24.0	3 1.7 2 59.3	45.70 47.50	45.30 47.00	..... .....	144 32 3.32 287 33 14.52	+ 0.95 + 2.61	+ 12.44 - 12.11	-2 47.44 +2 47.44	-32 37 54.84
11	Sept. 22, H. χ Draconis	E W	...	18 19 48.0 18 25 49.0	3 0.9 3 0.1	51.55 43.40	50.00 44.50	..... .....	182 16 25.12 249 48 50.38	+ 5.63 + 0.53	+ 7.43 - 7.36	- 37.01 + 37.01	+72 41 56.46
12	4 H. Scuti	W E	...	18 33 57.0 18 39 57.0	3 4.1 2 55.9	46.90 45.00	47.45 47.00	..... .....	167 59 35.80 264 5 39.82	+ 3.15 + 2.36	+ 19.09 - 17.43	-1 1.62 +1 1.62	- 9 8 28.22
13	ζ Sagittarii	E W	...	18 53 26.0 18 59 29.0	3 4.2 2 58.8	46.20 48.95	47.20 48.45	..... .....	284 56 43.22 147 8 32.30	+ 2.68 + 4.10	- 13.36 + 12.59	+2 22.85 -2 22.85	-30 0 57.86
14	25 H. Camelop. S.P.	W E	...	19 7 42.0 19 13 42.0	3 6.3 2 53.7	47.05 45.00	47.85 46.50	..... .....	274 30 19.35 157 34 57.28	+ 3.19 + 2.01	+ 2.23 - 1.94	+1 30.22 -1 30.22	+82 35 29.31
15	6 Vulpeculæ	E W	...	19 21 43.0 19 27 44.0	3 0.3 3 0.7	45.50 48.60	46.80 48.20	..... .....	230 29 56.82 201 35 17.82	+ 2.46 + 3.99	- 50.30 + 50.52	+ 14.34 - 14.34	+24 28 34.10
16	63 Sagittarii	W E	...	19 53 32.0 19 59 32.0	3 4.4 2 55.6	45.00 43.05	46.70 45.85	..... .....	163 14 15.65 268 51 2.35	+ 2.00 + 1.10	+ 17.58 - 15.94	-1 13.33 +1 13.33	-13 54 2.71
17	66 Aquilæ	E W	...	20 5 7.0 20 11 29.0	3 10.0 3 12.0	43.90 47.80	46.10 47.90	..... .....	256 15 11.45 175 50 6.08	+ 1.52 + 3.42	- 23.71 + 24.22	+ 47.12 - 47.11	- 1 17 38.12
18	296 G. Sagittarii	W E	...	20 16 21.0 20 22 27.0	3 13.6 2 52.4	46.90 42.95	47.90 45.95	..... .....	148 10 56.45 283 54 19.45	+ 3.27 + 1.01	+ 15.02 - 11.91	-2 16.20 +2 16.19	-28 58 26.34

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
21 18 42	65.9	69.0	30.016					1	216 2 40.44	-12.85
18 52	65.9	...	...					2	40.51	...
19 11	65.3	...	...					3	40.72	-20.83
19 19	...	67.0	30.008					4	40.68	...
19 25	65.3	...	...					5	41.38	-18.26
19 35	64.7	...	...					6	40.08	-20.56
19 52	64.8	...	...					7	42.07	-15.69
20 8	64.2	...	...					8	41.36	...
20 19	63.9	66.0	30.008					9	40.62	...
20 30	63.8	...	...					10	40.86	...
20 43	63.5	...	...					11	40.86	...
20 55	63.2	...	...					12	41.40	...
21 1	...	65.0	30.007					13	40.76	...
22 18 15	...	76.0	29.990					14	41.06	...
18 23	73.5	...	...					15	40.66	...
18 37	72.8	...	...					16	41.37	19.02
18 47	...	75.0	29.990					17	41.50	23.22
18 56	72.0	...	...					18	41.64	-15.62
19 11	72.2	...	...					
19 18	...	74.0	29.994							
19 25	71.4	...	...					
19 49	...	73.5	29.994							
19 57	70.2	...	...					
20 8	69.9	...	...					
20 19	69.7	72.5	29.989							

Notes.

1 E. One level reading increased 10 div.
4 E, 7 W. One microscope reading decreased 10''.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	73 Draconis	E		20 29 51.0	3 1.0	44.90	46.40		180 20 38.05	+ 1.88	+ 6.31	- 40.07	+74 37 51.92
		W		20 35 48.0	2 56.0	48.60	48.50		251 44 38.35	+ 4.04	- 5.97	+ 40.07	
2	ω Capricorni	W		20 42 44.0	3 22.2	48.00	48.90		149 52 30.65	+ 4.02	+ 16.85	- 2 5.60	-27 16 38.32
		E		20 49 3.0	2 56.8	43.40	45.75		282 12 42.28	+ 1.11	- 12.80	+ 2 5.50	
3	η Capricorni	E		20 55 58.0	2 59.2	44.50	46.10		275 10 38.40	+ 1.62	- 14.80	+ 1 33.20	-20 13 59.36
		W		21 1 58.0	3 0.8	50.15	48.75		150 54 39.50	+ 4.64	+ 15.16	- 1 33.20	
4	4 Piscis Australis	W		21 9 11.0	2 56.7	48.30	48.35		144 35 30.65	+ 4.00	+ 11.77	- 2 44.85	-32 34 23.57
		E		21 15 6.0	2 58.3	44.30	46.30		287 29 47.52	+ 1.82	- 11.99	+ 2 44.85	
5	Sept. 24. H. Scuti	E		18 23 29.0	0 15.1	52.45	51.45		260 34 3.28	+ 2.63	- 0.11	+ 1 16.10	-14 37 26.35
		W		18 29 17.0	5 32.9	52.40	51.00		162 30 13.08	+ 2.41	+ 56.55	- 1 16.24	
6	φ Sagittarii	W		18 36 38.0	3 1.9	51.00	50.00		150 3 58.50	+ 1.66	+ 13.68	- 2 6.00	-27 5 14.01
		E		18 42 36.0	2 56.1	50.55	50.00		282 1 14.75	+ 1.45	- 12.83	+ 2 6.00	
7	ζ Sagittarii	E		18 57 54.0	3 3.4	51.60	51.05		282 44 29.25	+ 2.20	- 13.74	+ 2 10.66	-27 48 32.79
		W		19 3 54.0	2 56.0	52.20	51.10		149 20 44.78	+ 2.45	+ 12.74	- 2 10.67	
8	22 Aquilæ	W		19 8 45.0	3 1.8	50.60	50.05		181 47 45.92	+ 1.54	+ 24.83	- 38.59	+ 4 40 11.51
		E		19 14 41.0	2 54.2	51.25	50.55		250 17 26.45	+ 1.95	- 22.80	+ 38.59	
9	5 Vulpeculæ	E		19 19 22.0	2 40.7	51.50	50.60		235 3 20.98	+ 2.04	- 31.63	+ 19.56	+19 54 44.89
		W		19 25 15.0	3 12.3	51.25	50.00		197 1 39.80	+ 1.70	+ 45.28	19.56	
10	σ Aquilæ	W		19 31 27.0	3 1.3	50.45	50.20		182 18 33.08	+ 1.45	+ 25.01	- 37.90	+ 5 11 0.19
		E		19 37 28.0	2 59.7	51.30	50.45		249 46 39.60	+ 1.84	- 24.57	+ 37.90	
11	ε Draconis	E		19 45 35.0	2 58.7	52.55	51.75		184 56 30.70	+ 2.85	+ 8.96	- 34.30	+70 1 47.72
		W		19 51 32.0	2 58.3	52.45	50.95		247 8 42.32	+ 2.44	- 8.92	+ 34.31	
12	Groombridge 1418 S. P.	E		20 23 23.0	2 47.6	49.05	49.50		160 22 42.48	+ 0.69	- 1.16	- 1 23.37	+85 23 23.13
		W		20 29 26.0	3 15.4	51.35	51.45		271 42 31.45	+ 2.49	+ 1.57	+ 1 23.37	
13	3 Aquarii	W		20 39 36.0	3 5.5	51.20	50.15		171 45 19.65	+ 1.73	+ 20.82	- 55.67	- 5 22 34.46
		E		20 45 38.0	2 56.5	49.80	49.95		260 19 50.90	+ 1.25	- 18.85	+ 55.65	
14	f ¹ Cygni	E		20 53 41.0	2 55.0	51.70	50.45		207 47 55.18	+ 2.08	+ 1.67	- 8.28	+47 9 4.34
		W		20 59 37.0	3 1.0	52.50	50.65		224 17 21.15	+ 2.37	- 1 5.97	+ 8.28	
15	98 B. Cephei	W		21 4 29.0	3 4.5	51.50	50.20		254 51 9.78	+ 1.83	- 4.89	+ 45.95	+77 44 30.05
		E		21 10 27.0	2 53.5	48.95	48.85		177 14 7.38	+ 0.30	+ 4.33	- 45.95	
16	Sept. 25. H. Cephei S. P.	E		18 52 11.0	3 17.8	45.15	50.90		162 10 48.45	+ 2.15	- 1.01	- 1 17.22	+87 11 37.97
		W		18 58 12.0	2 43.2	42.90	49.45		260 54 24.45	+ 0.58	+ 0.69	+ 1 17.22	
17	21 Aquilæ	W		19 5 39.0	3 14.3	42.45	49.25		179 15 40.68	+ 0.89	+ 26.74	- 42.32	+ 2 8 6.27
		E		19 11 55.0	3 1.7	44.00	50.70		252 49 21.05	+ 0.96	- 23.38	+ 42.32	
18	225 B. Draconis	E		19 24 34.0	3 2.6	51.05	50.85		175 33 34.32	+ 2.34	+ 4.00	- 48.38	+70 25 2.57
		W		19 30 35.0	2 58.4	48.50	49.15		256 31 38.58	+ 0.77	- 3.82	+ 48.38	

Time	Ther- 88°	Att. ther	Barom	Observation made at V with fixed thread, except as noted below					No.	Zenith point.	Red. to 1903.0.
<i>h m</i>											
22 10 11	69.8								1	216 2 41.33	
20 10	69.6								2	41.00	17.54
20 09	69.9								3	43.22	20.03
21 12	68.8	71.5	29.986						4	41.88	
24 18 26	59.8	63.5	29.736						5	38.90	
18 40	59.5								6	38.60	
18 48		62.5	29.742						7	38.84	-11.12
19 1	68.1								8	38.94	22.68
19 12	67.7								9	39.08	27.20
19 23	67.1	60.5	29.746						10	38.20	23.29
19 34	66.3								11	39.18	
19 43		59.5	29.750						12	38.76	+30.70
20 09	66.1								13	37.74	
20 29		68.0	29.750						14	38.24	32.51
20 46	54.7								15	39.16	
20 41	54.7								16	37.66	
20 57	54.9								17	36.47	21.70
21 7	54.4								18	38.10	32.70
21 15		66.5	29.780								
18 45		65.0	29.700								
18 55	61.9										
19 9	60.9										
19 28	60.9										
19 48		62.5	29.796								

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>		<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Sept. 26, H. H. Scuti	E W	...	18 39 0.0 18 45 4.0	3 5.6 2 58.4	50.60 48.05	50.05 48.35	..... .....	250 48 6.22 172 17 5.42	+ 2.99 + 1.51	-21.06 +19.45	+ 53.48 - 53.48	- 4 50 47.61
2	51 H. Cephei s. p.	W E	...	18 52 12.0 18 58 12.0	3 17.3 2 42.7	47.65 50.45	47.80 50.05	..... .....	269 54 27.02 162 10 46.78	+ 1.04 + 3.03	+ 1.00 - 0.68	+ 16.38 - 16.38	+87 11 36.91
3	ϕ Sagittarii	E W	...	19 6 36.0 19 12 38.0	3 4.1 2 57.9	49.55 48.40	49.75 47.95	..... .....	280 21 24.70 151 43 50.85	+ 2.68 + 1.52	-14.41 +13.46	+ 55.86 - 55.87	-25 25 12.69
4	<i>b</i> Aquilæ	W E	...	19 17 27.0 19 23 25.0	2 57.7 3 0.3	47.00 50.30	47.60 49.70	..... .....	188 51 58.50 243 13 16.05	+ 0.68 + 2.95	+28.72 -29.56	- 28.78 + 28.80	+11 44 37.19
5	ϵ Sagittæ	E W	...	19 29 54.0 19 36 13.0	3 4.0 3 15.0	50.65 47.90	49.75 47.65	..... .....	238 42 57.15 193 22 12.30	+ 2.96 + 1.03	-35.78 +40.19	+ 23.44 - 23.45	+16 15 7.90
6	φ Aquilæ	W E	...	19 48 36.0 19 54 40.0	3 6.9 2 57.1	46.50 49.30	47.25 49.15	..... .....	188 17 43.28 243 47 27.05	+ 0.58 + 2.33	+31.22 -28.05	- 29.55 + 29.55	+11 10 24.07
7	ρ Aquilæ	E W	...	20 6 45.0 20 12 50.0	3 6.7 2 58.3	49.55 47.15	49.00 47.40	..... .....	240 3 29.25 192 1 48.58	+ 2.33 + 0.88	-35.12 +32.03	+ 25.05 - 25.05	+14 54 34.21
8	Groombridge 1418 s. p.	W E	...	20 23 23.0 20 29 23.0	2 48.5 3 11.5	47.65 49.25	47.90 48.60	..... .....	271 42 36.02 160 22 40.42	+ 1.11 + 1.95	+ 1.17 - 1.51	+ 22.13 - 22.13	+85 23 22.40
9	ω Capricorni	E W	...	20 43 0.0 20 48 58.0	3 7.1 2 50.9	48.75 47.90	48.60 47.65	..... .....	282 12 39.40 149 52 37.48	+ 1.79 + 1.08	-14.43 +12.04	+ 6.61 - 6.60	-27 16 37.93
10	<i>A</i> Capricorni	W E	...	20 58 27.0 21 4 30.0	3 5.3 2 57.7	47.00 48.55	47.60 48.65	..... .....	151 45 44.20 280 19 28.78	+ 1.91 + 1.86	+14.61 -13.43	- 56.28 + 56.27	-25 23 17.77
11	ϵ Capricorni	E W	...	21 13 59.0 21 20 0.0	2 56.8 3 4.2	48.65 47.70	48.85 47.80	..... .....	272 11 16.25 159 53 58.48	+ 1.98 + 1.26	-15.25 +16.55	+ 23.79 - 23.79	-17 14 30.39
12	358 B. Cygni	W E	...	21 25 12.0 21 31 12.0	3 5.3 2 54.7	46.95 48.15	47.35 48.25	..... .....	229 19 48.78 202 45 31.42	+ 0.79 + 1.55	-38.86 +34.54	+ 13.31 - 13.31	+52 12 1.66
13	Sept. 29, H. τ Sagittarii	E W	...	18 57 53.0 19 3 56.0	3 5.3 2 57.7	50.85 50.20	48.95 48.75	..... .....	282 44 25.82 149 20 48.92	+ 2.60 + 2.32	-14.03 +12.90	+ 12.65 - 12.65	-27 48 31.04
14	22 Aquilæ	W E	...	19 8 45.0 19 14 54.0	3 2.7 3 6.3	48.95 49.75	48.20 48.65	..... .....	181 47 46.45 250 17 28.02	+ 1.73 + 2.18	+25.08 -26.08	- 39.24 + 39.24	+ 4 40 12.07
15	6 Vulpeculæ	E W	...	19 21 41.0 19 27 39.0	3 3.6 2 54.4	50.95 49.05	49.10 48.45	..... .....	230 29 56.18 201 35 21.78	+ 2.79 + 1.85	-52.17 +47.07	+ 14.87 - 14.87	+24 28 33.82
16	54 Sagittarii	W E	...	19 32 11.0 19 38 15.0	3 4.1 2 59.9	48.65 49.70	47.90 49.05	..... .....	160 37 48.68 271 27 24.12	+ 1.50 + 2.35	+16.74 -15.99	- 23.50 + 23.54	-16 30 38.56
17	<i>g</i> Sagittarii	E W	...	19 49 28.0 19 55 24.0	3 4.2 2 51.8	51.90 50.35	49.40 48.80	..... .....	270 41 26.58 161 23 49.05	+ 3.20 + 2.45	-16.99 +14.78	+ 21.20 - 21.20	-15 44 37.42
18	68 Draconis	W E	...	20 7 1.0 20 13 47.0	3 3.3 3 42.7	48.30 48.70	47.65 48.20	..... .....	238 54 52.98 193 10 11.82	+ 1.21 + 1.57	-17.33 +25.58	+ 24.39 - 24.39	+61 47 40.08

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>' "</i>	<i>"</i>
26 18 35	...	69.5	29.906					1	216 2 37.26	-17.95
18 42	67.5	...	...					2	39.10	...
18 55	67.5	...	...					3	39.40	...
19 4	...	68.5	29.906					4	38.68	...
19 10	66.5	...	...					5	38.92	-26.88
19 20	66.9	...	...					6	38.20	-26.14
19 33	65.6	67.5	29.912					7	38.98	-27.75
19 52	65.1	...	...					8	39.58	+31.20
20 0	...	66.5	29.912					9	38.68	-17.29
20 10	64.6	...	...					10	38.96	-18.56
20 26	64.6	...	...					11	39.64	...
20 34	...	66.0	29.910					12	39.11	-32.11
20 46	64.3	...	...					13	39.26	-11.04
21 1	64.0	...	...					14	38.69	-22.69
21 9	...	66.0	29.902					15	...	...
21 17	63.4	...	...					16	38.75	...
21 28	63.2	...	...					17	38.72	-18.14
21 35	...	65.0	29.902					18	39.84	...
29 18 47	...	60.5	30.154						37.92	-34.45
19 1	57.7	...	...					
19 12	56.1	...	...					
19 19	...	59.0	30.158							
19 25	56.2	...	...					
19 35	55.9	...	...					
19 44	...	58.0	30.160							
19 52	55.7	...	...					
20 10	55.2	...	...					

Notes.

4 W. 5 W. One microscope reading decreased 10".
9 W. Two microscope readings decreased 10" each.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	69 Aquilæ	E		20 21 36.0	3 4.0	50.45	49.00		258 9 26.18	+ 2.56	-21.39	+ 52.31	- 3 12 4.68
		W		20 27 35.0	2 55.0	49.55	47.90		173 55 48.02	+ 1.77	+19.35	- 52.31	
2	10 Capricorni	W		20 46 21.0	3 3.5	47.10	46.95		158 51 29.55	+ 0.54	+16.14	-1 29.67	-18 17 6.86
		E		20 52 19.0	2 54.5	49.00	48.50		273 13 46.80	+ 1.88	-14.59	+1 29.67	
3	θ Capricorni	E		20 57 30.0	3 5.2	49.95	48.75		272 33 29.20	+ 2.28	-16.63	+1 27.52	-17 36 45.94
		W		21 3 30.0	2 54.8	48.70	47.25		159 31 48.52	+ 1.20	+14.81	-1 27.52	
4	4 Piscis Australis	W		21 9 5.0	3 4.1	48.15	47.30		144 35 36.32	+ 1.04	+12.78	-2 51.23	-32 34 22.24
		E		21 15 6.0	2 56.0	48.95	48.10		287 29 35.78	+ 1.67	-11.80	+2 51.22	
5	b Capricorni	E		21 20 33.0	2 44.1	49.75	48.75		277 9 47.82	+ 2.24	-12.08	+1 44.73	-22 13 25.94
		W		21 26 12.0	2 54.9	49.50	48.00		154 55 26.58	+ 1.78	+13.72	-1 44.74	
6	41 Capricorni	W		21 33 30.0	3 4.9	48.45	47.20		153 27 11.18	+ 1.06	+14.96	-1 51.41	-23 41 45.50
		E		21 39 27.0	2 52.1	48.95	48.00		278 38 0.28	+ 1.53	-12.96	+1 51.41	
7	Sept. 30, H. 51 H. Cephei S. P.	E		18 52 12.0	3 20.1	48.25	47.85		162 10 47.98	+ 2.35	- 1.03	-1 17.43	+87 11 35.86
		W		18 58 12.0	2 30.9	48.00	48.35		269 54 26.12	+ 2.43	+ 0.66	+1 17.45	
8	♂ Sagittarii	W		19 6 36.0	3 4.6	47.35	47.50		151 43 51.60	+ 2.13	+14.49	-1 57.46	-25 25 12.26
		E		19 12 34.0	2 53.4	47.60	48.25		280 21 21.60	+ 2.47	-12.78	+1 57.46	
9	186 G. Sagittarii	E		19 17 49.0	3 4.9	48.45	48.70		284 51 34.05	+ 2.98	-13.48	+2 25.62	-29 55 52.78
		W		19 23 49.0	2 55.1	48.85	48.10		147 13 40.82	+ 2.84	+12.09	-2 25.62	
10	f Sagittarii	W		19 37 40.0	3 7.3	46.40	47.05		157 9 15.90	+ 1.49	+16.34	-1 34.18	-19 59 23.73
		E		19 43 43.0	2 55.7	47.40	48.15		274 55 58.22	+ 2.47	-14.38	+1 34.18	
11	Groombridge 3402	E		19 53 4.0	3 10.0	47.10	47.25		166 8 25.42	+ 1.63	+ 0.40	-1 7.74	+88 50 35.26
		W		19 59 3.0	2 49.0	46.40	47.50		265 56 47.72	+ 1.61	+ 0.32	+1 7.74	
12	68 Draconis	W		20 7 10.0	2 54.2	45.70	46.65		238 54 51.90	+ 1.00	-15.65	+ 24.11	+61 47 39.23
		E		20 13 5.0	3 0.8	46.95	48.25		193 10 21.58	+ 2.05	+16.86	- 24.11	
13	Groombridge 1418 S. P.	E		20 23 23.0	2 50.2	47.50	47.60		160 22 40.55	+ 1.57	- 1.20	-1 23.35	+85 23 21.52
		W		20 29 26.0	3 12.8	47.90	48.25		271 42 34.20	+ 2.37	+ 1.53	+1 23.35	
14	3 Aquarii	W		20 39 34.0	3 8.3	46.65	47.10		171 45 20.52	+ 1.61	+21.45	- 55.69	- 5 22 34.60
		E		20 45 37.0	2 54.7	47.25	48.05		260 19 50.98	+ 2.36	-18.46	+ 55.68	
15	γ Microscopii	E		20 52 25.0	3 1.1	48.00	48.20		287 33 13.18	+ 2.53	-12.36	+2 49.15	-32 37 57.24
		W		20 58 22.0	2 55.9	47.35	47.15		144 32 0.48	+ 1.56	+11.66	-2 49.16	
16	ε Capricorni	W		21 14 4.0	2 52.2	45.00	46.10		159 54 2.32	+ 0.35	+14.47	-1 25.09	-17 14 30.61
		E		21 19 48.0	2 51.8	46.70	47.60		272 11 14.22	+ 1.84	-14.40	+1 25.09	
17	358 B. Cygni	E		21 25 14.0	3 3.5	47.50	47.95		202 45 25.78	+ 2.30	+38.11	- 13.52	+32 12 2.60
		W		21 31 48.0	3 30.5	46.65	46.80		229 19 59.40	+ 1.60	-50.12	+ 13.52	
18	11 Cephei	W		21 37 20.0	3 17.1	46.55	46.65		247 59 18.92	+ 1.36	-10.20	+ 35.70	+70 52 23.91
		E		21 43 6.0	2 28.9	46.60	47.40		184 5 59.45	+ 1.88	+ 5.82	- 35.71	

Time.	Ther- (882)	Att. ther	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
<i>h m s</i>			<i>mm</i>			<i>° ' "</i>	<i>"</i>
20 20 15		58.0	10.172		1	216 2 38.24	-23.46
20 25	54.4				2	40.16	-19.90
20 41	54.4	56.5	10.174		3	39.69	
20 49	51.2				4	37.89	
21 0	51.4				5	40.02	-20.07
21 12	51.4				6	38.02	-20.11
21 21	51.9	54.5	10.181		7	39.26	
21 26	51.7				8	39.76	
21 41		56.0	10.189		9	40.65	-11.46
21 48 45		59.5	10.176		10	40.02	-16.04
19 51	61.5				11	38.24	-12.85
19 10	64.1				12	38.87	-34.59
19 21	64.4	66.5	10.174		13	39.22	-12.04
19 41	62.5				14	39.71	
19 56	64.9	64.0	10.179		15	38.52	
20 15	65.9				16	39.40	
20 26	62.5	63.5	10.168		17	38.54	-11.23
20 38	60.9				18	38.61	
20 56	60.8	63.5	10.168				
21 15	60.1						
21 29	59.9	62.5	10.169				
21 48	59.7						
21 48		61	10.166				

Note.

14 W One microscope reading increased 12"

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	October 7, H.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	225 B. Draconis	E W	...	19 24 35.0 19 30 35.0	3 1.7 2 58.3	47.50 42.15	51.80 47.15	...	175 33 29.28 256 31 42.00	+ 4.61 + 0.76	+ 3.95 - 3.81	- 47.35 + 47.35	+79 25 4.62
2	228 G. Sagittarii	W E	...	19 36 51.0 19 42 53.0	3 5.0 2 57.0	41.55 46.25	47.75 51.10	...	145 1 26.12 287 3 45.30	+ 0.82 + 3.94	+ 13.00 - 11.90	- 2 39.88 + 2 39.87	-32 8 21.86
3	269 G. Sagittarii	E W	...	19 54 52.0 20 1 4.0	3 13.5 2 58.5	45.85 43.10	50.40 48.50	...	277 48 12.72 154 16 58.20	+ 3.20 + 1.57	- 16.62 + 14.14	+ 1 43.05 - 1 43.05	-22 51 49.02
4	4 Capricorni	W E	...	20 9 15.0 20 15 15.0	3 10.6 2 49.4	46.50 49.05	48.40 49.70	...	155 2 25.48 277 2 43.42	+ 1.34 + 2.81	+ 16.33 - 12.90	- 1 39.88 + 1 39.88	-22 6 18.25
5	Groombridge 1418 S. P.	E W	...	20 23 28.0 20 29 25.0	2 48.0 3 9.0	49.15 47.00	49.80 49.10	...	160 22 35.05 271 42 36.10	+ 2.86 + 1.87	- 1.16 + 1.48	- 1 21.17 + 1 21.17	+85 23 20.76
6	ω Capricorni	W E	...	20 43 7.0 20 49 2.0	3 1.3 2 53.7	46.55 48.00	48.45 49.50	...	149 52 32.35 282 12 38.42	+ 1.39 + 2.38	+ 13.55 - 12.44	- 2 5.21 + 2 5.20	-27 16 39.02
7	η Capricorni	E W	...	20 55 54.0 21 1 54.0	3 5.4 2 54.6	49.20 47.05	50.00 48.45	...	275 10 35.85 156 54 38.70	+ 2.98 + 1.58	- 15.94 + 14.14	+ 1 32.82 - 1 32.82	-20 14 0.34
8	ϵ Capricorni	W E	...	21 13 56.0 21 19 52.0	3 1.1 2 54.9	46.45 48.25	48.15 49.30	...	159 53 57.00 272 11 16.72	+ 1.48 + 2.30	+ 16.00 - 14.92	- 1 22.75 + 1 22.74	-17 14 30.84
9	β Cephei	E W	...	21 24 25.0 21 30 25.0	3 6.8 2 53.2	49.40 46.80	49.45 48.45	...	184 49 36.48 247 15 34.50	+ 2.96 + 1.66	+ 9.70 - 8.34	- 33.71 + 33.71	+70 8 39.77
10	π Cephei	W E	...	21 37 30.0 21 43 30.0	3 7.7 2 52.3	45.70 47.30	47.75 49.05	...	247 59 21.50 184 5 54.18	+ 0.95 + 2.17	- 9.25 + 7.80	+ 34.69 - 34.69	+70 52 25.94
11	October 12, H. 269 G. Sagittarii	E W	...	19 55 0.0 20 1 3.0	3 5.8 2 57.2	52.50 50.70	50.80 49.00	...	277 48 35.08 154 17 27.58	+ 2.89 + 1.82	- 15.32 + 13.93	+ 1 45.13 - 1 45.13	-22 51 48.09
12	ρ Aquilæ	W E	...	20 5 47.0 20 12 56.0	4 6.3 3 2.7	48.80 51.70	48.35 50.65	...	192 1 46.68 240 3 52.15	+ 1.05 + 3.09	+ 1.11 - 33.64	- 25.28 + 25.28	+14 54 35.04
13	73 Draconis	E W	...	20 29 48.0 20 35 48.0	3 5.3 2 54.7	52.70 50.35	50.50 48.95	...	180 20 56.75 251 45 6.60	+ 2.96 + 1.54	+ 6.62 - 5.88	- 40.84 + 40.85	+74 37 55.51
14	3 Piscis Australis	W E	...	21 4 37.0 21 10 35.0	3 2.0 2 56.0	49.25 51.30	48.60 50.55	...	149 9 7.02 282 56 55.10	+ 1.05 + 2.53	+ 13.49 - 12.62	- 2 12.67 + 2 12.66	-28 0 37.69
15	b Capricorni	E W	...	21 20 11.0 21 26 13.0	3 7.3 2 54.7	52.05 50.30	50.90 48.85	...	277 10 17.48 154 55 47.42	+ 2.69 + 1.76	- 15.74 + 13.69	+ 1 42.99 - 1 43.00	-22 13 27.08
16	41 Capricorni	W E	...	21 33 26.0 21 39 31.0	3 10.1 2 54.9	49.50 51.10	48.65 50.50	...	153 27 32.78 278 38 27.50	+ 1.32 + 2.26	+ 15.82 - 13.39	- 1 49.56 + 1 49.56	-23 41 46.08
17	13 Cephei	E W	...	21 48 38.0 21 54 36.0	3 6.7 2 51.3	52.85 50.25	50.90 48.90	...	198 48 25.82 233 17 33.58	+ 3.00 + 1.67	+ 27.78 - 23.39	- 17.72 + 17.72	+56 9 42.05
18	October 13, H. 4 Capricorni	E W	...	20 9 12.0 20 15 9.0	3 13.9 2 43.1	51.50 51.60	49.80 49.55	...	277 3 12.42 155 2 57.15	+ 3.87 + 3.75	- 16.90 + 11.95	+ 1 42.00 - 1 42.00	-22 6 18.57

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
7 19 21	...	71.5	29.812					1	216 2 38.40	-33.82
19 28	69.3	...	...					2	38.64	-11.36
19 40	69.1	...	...					3	36.60	-15.55
19 50	...	71.0	29.808					4	38.24	-16.50
19 58	68.8	...	...					5	38.10	+33.21
20 12	68.8	...	...					6	37.82	-16.28
20 26	68.7	70.0	29.806					7	38.66	-19.05
20 46	68.1	...	...					8	39.28	...
20 59	67.9	70.0	29.802					9	38.48	...
21 17	67.9	...	...					10	38.68	...
21 27	67.8	...	...					11	216 3 2.99	-15.47
21 40	67.6	69.5	29.792					12	5.22	-28.31
12 19 48	...	61.0	29.796					13	4.30	...
19 58	68.7	...	...					14	3.28	-16.63
20 10	68.0	...	...					15	3.64	-19.00
20 18	...	60.5	29.796					16	3.14	-18.94
20 33	57.1	...	...					17	4.23	-35.02
21 1	...	59.5	29.811					18	6.12	-16.35
21 8	56.7	...	...					
21 23	56.1	...	...					
21 36	55.8	...	...					
21 45	...	58.5	29.816							
21 52	55.4	...	...					
13 20 5	...	61.5	29.842							
20 12	58.9	...	...					

Notes.

- Two level readings increased 10 div. each.
 One level reading increased 10 div.
 One level reading increased 2 div.
 Faint and difficult.
 Clock time decreased 1^m.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ω^1 Cygni	W	...	20 24 9.0	3 0.1	50.05	49.30	.....	225 46 36.95	+ 3.00	-53.87	+ 9.73	+48 38 7.10
		E	...	20 30 5.0	2 55.9	48.85	48.55	.....	206 19 30.68	+ 2.66	+51.39	- 9.73	
2	19 Capricorni	E	...	20 46 19.0	3 6.5	51.15	49.55	.....	273 14 15.90	+ 3.31	-16.67	+1 27.88	-18 17 7.92
		W	...	20 52 12.0	2 46.5	51.25	49.45	.....	158 51 51.80	+ 3.93	+13.29	-1 27.88	
3	θ Capricorni	W	...	20 57 30.0	3 6.2	50.15	48.90	.....	159 32 8.62	+ 2.64	+16.81	-1 25.69	-17 36 47.61
		E	...	21 3 31.0	2 54.8	49.75	48.75	.....	272 33 56.90	+ 3.22	-14.81	+1 25.69	
4	4 Piscis Australis	E	...	21 9 4.0	3 6.1	50.45	49.40	.....	287 30 10.15	+ 2.00	-13.06	+2 47.73	-32 34 25.32
		W	...	21 15 4.0	2 53.9	50.80	49.05	.....	144 35 50.40	+ 3.68	+11.40	-2 47.72	
5	b Capricorni	W	...	21 20 34.0	2 44.2	50.35	48.95	.....	154 55 48.90	+ 3.45	+12.09	-1 42.60	-22 13 26.70
		E	...	21 26 13.0	2 54.8	49.70	49.15	.....	277 10 16.90	+ 2.68	-13.71	+1 42.68	
6	41 Capricorni	E	...	21 34 0.0	2 36.1	50.75	49.55	.....	278 38 25.75	+ 3.26	-10.66	+1 49.19	-23 41 45.11
		W	...	21 39 32.0	2 55.9	50.95	49.20	.....	153 27 35.90	+ 3.67	+13.54	-1 49.19	
7	158 B. Cephei	W	...	21 48 39.0	3 8.4	49.25	48.50	.....	250 22 27.35	+ 2.32	- 7.69	+ 38.81	+73 15 10.54
		E	...	21 54 39.0	2 51.6	49.85	48.95	.....	181 43 42.28	+ 3.25	+ 6.39	- 38.81	
8	μ Piscis Australis	E	...	21 59 42.0	3 8.3	50.00	49.25	.....	288 23 4.60	+ 3.16	-13.17	+2 56.68	-33 27 26.98
		W	...	22 5 46.0	2 55.7	49.95	48.70	.....	143 43 6.22	+ 2.89	+11.47	-2 56.66	
9	ρ Aquarii	W	...	22 12 7.0	3 5.5	48.05	48.10	.....	168 50 24.02	+ 1.71	+19.68	-1 1.45	- 8 18 5.80
		E	...	22 18 7.0	2 54.5	49.05	48.80	.....	263 15 42.02	+ 2.92	-17.42	+1 1.45	
10	β Piscis Australis	E	...	22 23 0.0	3 6.4	49.55	49.00	.....	287 46 0.48	+ 2.44	-13.04	+2 50.71	-32 50 18.26
		W	...	22 29 1.0	2 54.6	49.60	48.55	.....	144 20 7.65	+ 2.29	+11.44	-2 50.71	
11	γ Piscis Australis	W	...	22 44 10.0	3 5.0	46.95	47.65	.....	143 47 25.95	+ 1.62	+12.73	-2 56.20	-33 23 4.90
		E	...	22 50 12.0	2 57.0	48.20	48.90	.....	288 18 41.45	+ 2.28	-11.65	+2 56.21	
12	β Piscium	E	...	22 55 59.0	3 4.3	49.30	49.00	.....	251 39 45.20	+ 3.12	-24.71	+ 40.84	+ 3 18 18.53
		W	...	23 1 56.0	2 52.7	49.00	48.05	.....	180 26 25.25	+ 2.00	+21.70	- 40.84	
13	October 14, H. 296 G. Sagittarii	W	...	20 16 38.0	2 58.9	48.10	48.20	.....	148 11 25.05	+ 1.41	+12.83	-2 17.40	-28 58 25.84
		E	...	20 22 20.0	2 43.1	47.05	47.70	.....	283 54 39.65	+ 0.58	-10.66	+2 17.40	
14	73 Draconis	E	...	20 29 52.0	3 1.0	48.80	48.55	.....	180 20 56.72	+ 1.62	+ 6.31	- 40.47	+74 37 56.04
		W	...	20 35 47.0	2 54.0	49.70	48.85	.....	251 45 6.12	+ 2.11	- 5.83	+ 40.47	
15	ω Capricorni	W	...	20 43 4.0	3 4.5	49.15	48.60	.....	149 52 58.68	+ 1.77	+14.03	-2 6.82	-27 16 39.80
		E	...	20 49 1.0	2 52.5	47.45	48.15	.....	282 13 5.02	+ 1.08	-12.27	+2 6.82	
16	B. A. C. 7504	W	...	21 16 1.0	3 11.0	48.30	48.10	.....	263 45 30.62	+ 1.46	- 1.22	+1 1.93	+86 38 45.52
		E	...	21 22 0.0	2 48.0	47.25	47.35	.....	168 20 35.68	+ 0.44	+ 0.95	-1 1.93	
17	ϵ Piscis Australis	E	...	21 36 10.0	3 6.9	47.55	48.10	.....	288 23 29.48	+ 1.22	-12.97	+2 55.44	-33 27 50.56
		W	...	21 42 10.0	2 53.1	50.15	48.80	.....	143 42 40.88	+ 2.07	+11.13	-2 55.43	
18	158 B. Cephei	W	...	21 48 39.0	3 8.2	48.50	48.30	.....	250 22 26.75	+ 1.25	- 7.68	+ 38.56	+73 15 10.42
		E	...	21 54 39.0	2 51.8	47.80	48.20	.....	181 43 42.20	+ 1.41	+ 6.40	- 38.56	
19	28 Pegasi	E	...	22 2 58.0	3 3.7	48.20	48.40	.....	234 28 7.50	+ 1.07	-42.44	+ 18.83	+20 30 34.71
		W	...	22 8 57.0	2 55.3	48.80	48.40	.....	197 37 50.22	+ 1.94	+38.65	- 18.83	

Time	Ther. (80°)	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>									<i>"</i>	<i>"</i>
13 20 27	59.0		29.836								1	216 1 5.40	-35.52
20 17		61.0									2	5.80	-19.13
20 19	61.2										3	6.09	
21 0	61.1										4	6.28	
21 12	57.9										5	5.15	-18.94
21 23	57.9	60.0	29.814								6	5.73	-18.86
21 42	57.7										7	6.95	
21 45		59.5	29.826								8	7.60	-16.71
21 52	57.5										9	6.46	-21.92
22 8	57.3										10	5.61	-12.10
22 15	62.0	59.0	29.826								11	5.00	-12.81
22 26	61.5										12	6.28	-26.15
22 42	61.5										13	4.41	-14.19
22 59	61.0										14	1.12	
23 6		58.0	29.826								15	4.16	-15.89
24 20 5		64.5	29.769								16	3.06	
20 19	61.5										17	5.01	-14.82
20 13	61.0										18	1.16	
20 46	61.1	61.5	29.764								19	2.97	-10.26
21 9		61.5	29.766										
21 19	60.6												
21 49	59.9												
21 46	59.9	62.5	29.768										
22 59	59.7												
22 6	59.6												

Note

11 W One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	47 Aquarii	W	...	22 13 10.0	3 5.9	47.95	48.15	.....	155 4 29.60	+ 1.02	+15.54	-1 41.60	-22 4 43.65
		E	...	22 10 17.0	2 55.1	47.95	48.35	.....	277 1 35.92	+ 1.51	-13.78	+1 41.60	
2	<i>v</i> Aquarii	E	...	22 26 23.0	3 7.0	48.35	48.40	.....	276 8 53.90	+ 1.40	-15.96	+1 38.09	-21 11 56.97
		W	...	22 32 25.0	2 55.0	49.20	48.75	.....	155 57 12.28	+ 1.93	+13.97	-1 38.09	
3	94 H ¹ . Aquarii	W	...	22 47 9.0	3 6.8	47.20	47.75	.....	171 38 28.72	+ 0.57	+21.06	- 55.49	- 5 29 52.19
		E	...	22 53 6.0	2 50.2	47.30	47.70	.....	260 27 33.65	+ 0.97	-17.48	+ 55.49	
4	<i>c</i> ¹ Aquarii	E	...	22 58 29.0	2 46.6	47.60	48.05	.....	279 12 24.85	+ 0.83	-12.03	+1 51.56	-24 15 40.18
		W	...	23 4 31.0	3 15.4	49.45	48.75	.....	152 53 44.25	+ 2.21	+16.55	-1 51.56	
5	October 18, H. Groombridge 3402	W	...	19 53 4.0	2 49.9	49.50	49.60	.....	265 57 11.70	+ 1.96	- 0.32	+1 8.80	+88 50 38.07
		E	...	19 59 4.0	3 10.1	47.50	48.60	.....	166 8 47.12	+ 0.69	+ 0.40	-1 8.82	
6	Groombridge 1418 S. P.	W	...	20 23 23.0	2 56.4	49.95	49.75	.....	271 42 58.98	+ 2.09	+ 1.29	+1 24.78	+85 23 19.23
		E	...	20 29 23.0	3 3.6	47.85	48.75	.....	160 23 4.18	+ 0.99	- 1.39	-1 24.80	
7	October 19, H. B. Ursæ Minoris S. P.	W	...	19 58 19.0	3 34.2	48.65	51.00	.....	268 11 33.20	+ 1.81	+ 0.47	+1 13.57	+88 54 55.49
		E	...	20 4 19.0	2 25.8	47.50	50.35	.....	163 54 26.38	+ 0.83	- 0.22	-1 13.57	
8	4 Capricorni	E	...	20 9 23.0	3 2.4	47.15	50.55	.....	277 3 7.45	+ 1.00	-14.95	+1 43.10	-22 6 18.05
		W	...	20 15 21.0	2 55.6	49.50	51.10	.....	155 2 54.42	+ 1.93	+13.86	-1 43.10	
9	Groombridge 1418 S. P.	W	...	20 23 23.0	2 56.7	48.30	51.00	.....	271 42 59.35	+ 1.54	+ 1.29	+1 23.73	+85 23 19.26
		E	...	20 27 41.0	1 21.3	47.75	50.40	.....	160 23 0.72	+ 1.08	- 0.27	-1 23.73	
10	19 Capricorni	W	...	20 46 21.0	3 4.0	48.45	50.60	.....	158 51 48.40	+ 1.61	+16.23	-1 28.79	-18 17 8.09
		E	...	20 52 25.0	3 0.0	48.00	50.95	.....	273 14 12.52	+ 1.22	-15.53	+1 28.79	
11	A Capricorni	E	...	20 58 31.0	3 2.4	48.70	50.65	.....	280 19 52.05	+ 1.72	-14.15	+1 58.62	-25 23 20.25
		W	...	21 4 29.0	2 55.6	50.15	51.10	.....	151 46 7.95	+ 1.91	+13.12	-1 58.62	
12	4 Piscis Australis	W	...	21 9 3.0	3 6.6	49.00	50.70	.....	144 35 52.48	+ 1.84	+13.13	-2 49.52	-32 34 26.05
		E	...	21 15 3.0	2 53.4	48.10	50.95	.....	287 30 4.05	+ 1.20	-11.34	+2 49.49	
13	<i>b</i> Capricorni	E	...	21 20 13.0	3 4.8	48.95	50.95	.....	277 10 16.08	+ 1.51	-15.32	+1 43.82	-22 13 27.63
		W	...	21 26 13.0	2 55.2	50.55	51.50	.....	154 55 44.82	+ 2.67	+13.77	-1 43.82	
14	41 Capricorni	W	...	21 33 32.0	3 3.6	48.70	51.05	.....	153 27 29.90	+ 1.82	+14.75	-1 50.51	-23 41 46.76
		E	...	21 39 28.0	2 52.4	47.25	50.65	.....	278 38 24.48	+ 0.89	-13.01	+1 50.49	
15	Bradley 2868	E	...	21 46 51.0	3 6.3	48.55	50.90	.....	199 12 9.85	+ 1.34	+28.59	- 17.42	+55 45 55.12
		W	...	21 52 52.0	2 54.7	50.35	51.35	.....	232 53 44.40	+ 2.54	-25.14	+ 17.42	
16	<i>v</i> Pegasi	W	...	21 57 50.0	3 3.4	50.35	51.40	.....	181 43 28.82	+ 2.50	+25.22	- 39.27	+ 4 35 31.55
		E	...	22 3 48.0	2 54.6	48.45	50.70	.....	250 22 29.85	+ 1.30	-22.86	+ 39.26	
17	<i>ρ</i> Aquarii	E	...	22 12 4.0	3 8.0	49.65	50.75	.....	263 15 39.25	+ 2.01	-20.22	+1 2.16	- 8 18 5.51
		W	...	22 18 0.0	2 48.0	51.00	51.50	.....	168 50 22.38	+ 2.44	+16.15	-1 2.16	
18	9 H. Draconis S. P.	W	...	22 24 1.0	2 52.6	50.25	51.75	.....	280 53 22.90	+ 2.61	+ 3.33	+2 2.10	+76 12 14.93
		E	...	22 29 53.0	2 59.4	49.05	50.00	.....	151 12 38.42	+ 1.47	- 3.60	-2 2.10	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>		<i>m.</i>						<i>° ' "</i>	<i>"</i>
14 22 16	59.1							1	216 3 4.00	-20 14
22 29	58.9	61.0	29.764					2	3.76	-20.56
22 50	58.1							3	3.74	-21.48
23 2	57.9							4	8.33	-20.12
23 8	...	60.5	29.764					5	0.76	-34.77
18 19 42	...	51.5	29.834					6	3.06	+34.85
19 56	48.1							7	1.24	
20 26	47.7							8	1.86	-15.94
20 42	...	49.5	29.846					9	1.86	+34.97
19 19 49	...	58.5	29.842					10	2.22	-18.60
20 1	54.2							11	1.30	-16.61
20 12	53.7							12	0.66	
20 26	53.9	56.0	29.842					13	1.76	-18.35
20 49	53.3							14	216 2 59.40	-18.20
21 2	53.2	56.0	29.843					15	216 3 0.70	-36.26
21 12	52.9							16	2.41	-27.08
21 23	52.7							17	1.00	-23.52
21 28	...	55.0	29.842					18	2.56	
21 36	52.1									
21 50	52.2									
22 1	52.0									
22 8	...	54.5	29.841							
22 15	51.6									
22 27	51.2									

Note.

7 W. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	67 Aquarii	E	...	22 35 9.0	3 7.7	48.25	50.70	.....	262 25 27.60	+ 1.50	-20.47	+1 0.38	- 7 27 50.87
	October 20, H.	W	...	22 41 13.0	2 56.3	51.10	51.60	.....	169 40 33.65	+ 2.57	+18.06	-1 0.38	
2	A Capricorni	W	...	20 58 28.0	3 5.2	46.10	48.95	.....	151 46 4.30	+ 1.62	+14.59	-1 56.10	-25 23 20.84
		E	...	21 4 26.0	2 52.8	43.75	47.65	.....	280 19 54.90	+ 1.02	-12.70	+1 56.16	
3	Capricorni	E	...	21 13 53.0	3 3.7	49.65	49.85	.....	272 11 41.70	+ 1.63	-16.47	+1 23.61	-17 14 31.45
		W	...	21 19 51.0	2 54.3	52.85	51.55	.....	159 54 20.10	+ 2.87	+14.83	-1 23.61	
4	β Cephei	W	...	21 25 0.0	2 30.9	51.10	50.55	.....	247 15 56.05	+ 2.50	- 6.33	+ 34.11	+70 8 41.44
		E	...	21 30 20.0	2 58.1	49.20	50.00	.....	184 50 1.25	+ 0.87	+ 8.82	- 34.11	
5	Piscis Australis	E	...	21 36 15.0	3 1.2	40.45	50.15	.....	288 23 25.08	+ 1.50	-12.19	+2 54.99	-33 27 50.84
		W	...	21 42 10.0	2 53.8	53.40	51.95	.....	143 42 34.85	+ 3.34	+11.22	-2 55.00	
6	134 G. Capricorni	W	...	21 50 18.0	3 7.3	51.65	51.00	.....	155 30 40.02	+ 2.37	+15.89	-1 39.38	-21 38 25.54
		E	...	21 56 22.0	2 56.7	48.95	50.00	.....	276 35 16.82	+ 1.30	-14.14	+1 39.38	
7	24 Cephei	E	...	22 5 27.0	2 37.3	50.65	50.65	.....	183 6 23.92	+ 1.78	+ 6.00	- 36.55	+71 52 23.01
		W	...	22 10 52.0	2 47.7	52.50	51.40	.....	248 59 34.85	+ 3.21	- 6.82	+ 36.55	
8	30 H. Camelop. s. p.	W	...	22 16 20.0	2 56.5	52.15	51.55	.....	274 3 36.72	+ 3.18	+ 1.88	+1 30.10	+83 2 34.31
		E	...	22 22 18.0	3 1.5	49.50	49.90	.....	158 2 24.92	+ 1.07	- 1.09	-1 30.11	
9	κ Aquarii	E	...	22 29 44.0	3 6.1	49.90	50.15	.....	259 41 1.02	+ 1.57	-21.22	+ 53.80	- 4 43 16.85
		W	...	22 35 45.0	2 54.9	53.00	51.55	.....	172 24 59.95	+ 3.10	+18.75	- 53.80	
10	γ Piscis Australis	W	...	22 44 7.0	3 7.3	52.15	51.40	.....	143 47 17.20	+ 2.97	+13.05	-2 54.50	-33 23 6.03
		E	...	22 50 11.0	2 56.7	48.75	49.85	.....	288 18 40.35	+ 0.92	-11.61	+2 54.49	
11	β Piscium	E	...	22 55 55.0	3 7.7	50.10	50.60	.....	251 39 44.40	+ 2.13	-25.63	+ 40.51	+ 3 18 18.13
		W	...	23 1 58.0	2 55.3	53.85	52.40	.....	180 26 18.85	+ 3.58	+22.36	- 40.51	
12	φ ¹ Aquarii	W	...	23 7 54.0	3 0.8	53.05	51.70	.....	167 31 53.20	+ 3.65	+18.25	-1 4.00	- 9 36 35.00
		E	...	23 13 49.0	2 54.2	49.60	50.05	.....	264 34 6.38	+ 1.05	-16.94	+1 4.00	
13	1 H. Cassiopeiae	E	...	23 22 37.0	3 4.1	50.65	50.70	.....	196 56 52.00	+ 2.00	+23.27	- 19.63	+58 1 20.25
		W	...	23 28 33.0	2 51.9	53.65	51.95	.....	235 9 1.82	+ 3.60	-20.30	+ 19.63	
14	μ Sculptoris	W	...	23 32 44.0	2 54.9	52.95	51.45	.....	144 34 0.82	+ 2.73	+11.53	-2 47.41	-32 36 17.17
	October 21, H.	E	...	23 38 36.0	2 57.1	49.10	49.95	.....	287 31 58.20	+ 1.61	-11.82	+2 47.39	
15	269 G. Sagittarii	E	...	19 55 0.0	3 4.9	49.45	50.00	.....	277 48 35.68	+ 1.10	-15.17	+1 45.63	-22 51 49.76
		W	...	20 1 0.0	2 55.1	56.80	53.70	.....	154 17 21.00	+ 5.41	+13.60	-1 45.64	
16	ζ Delphini	W	...	20 27 46.0	3 5.7	46.45	48.50	.....	191 28 26.72	+ 1.02	+34.10	- 26.12	+14 20 50.93
		E	...	20 33 47.0	2 55.3	49.00	50.25	.....	240 37 28.48	+ 3.01	-30.38	+ 26.11	
17	19 Capricorni	E	...	20 46 19.0	3 5.7	50.50	50.70	.....	273 14 12.30	+ 3.25	-16.53	+1 28.52	-18 17 7.66
		W	...	20 51 20.0	1 55.3	48.95	49.30	.....	158 51 58.30	+ 2.70	+ 6.37	-1 28.52	
18	θ Capricorni	W	...	20 58 32.0	2 3.4	47.10	48.60	.....	159 32 16.58	+ 1.21	+ 7.38	-1 26.32	-17 36 46.18
		E	...	21 2 32.0	1 56.6	49.15	50.45	.....	272 33 41.62	+ 3.22	- 6.59	+1 26.31	

Time	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>		<i>m</i>								<i>° ' "</i>	<i>"</i>
19 22 38	51.4									1	216 3 1.46	-23.74
22 45		53.5	29 836							2	1.85	-16.54
20 20 52		63.5	29 732							3	2.33	
21 1	61.7									4	1.58	
21 17	61.7									5	1.94	-15.03
21 28	60.9	61.0	29 730							6	1.13	-19.15
21 19	60.6									7	1.47	
21 48		62.5	29 732							8	2.88	+32.91
21 53	60.7									9	1.61	-24.44
22 8	59.9									10	1.44	-16.63
22 39	59.8									11	2.84	-26.05
22 29	59.4	62.0	29 736							12	2.80	-22.86
22 47	59.9									13	1.20	-31.05
22 59	58.7									14	1.52	-17.37
23 5		60.0	29 744							15	0.80	-15.02
23 11	58.0									16	1.47	-28.73
23 26	57.8									17	3.20	-18.57
23 36	58.3									18	1.70	.....
21 43		60.0	29 748	Notes								
21 19 52		61.5	29 926	* Barometer reading changed from 29 846 to 29 746 in.								
19 58	59.3											
23 22		60.0	29 926									
23 33	57.9											
23 49	57.0											
21 1	56.9	59.5	29 982									

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	B. A. C. 7504	E	...	21 16 53.0	2 15.9	50.10	50.10	.....	168 20 30.65	+ 2.93	+ 0.62	-1 2.98	+86 38 46.70
		W	...	21 21 19.0	2 10.1	48.50	49.45	.....	263 45 26.40	+ 2.46	- 0.57	+1 2.98	
2	358 B. Cygni	W	...	21 25 37.0	2 40.7	48.50	49.25	.....	229 20 2.90	+ 1.88	-20.23	+ 13.57	+52 12 5.34
		E	...	21 31 15.0	2 57.3	49.60	50.20	.....	202 45 46.52	+ 3.27	+35.58	- 13.57	
3	ν Cephei	E	...	21 39 40.0	3 3.2	51.35	50.85	.....	194 17 20.50	+ 3.97	+18.80	- 22.95	+60 40 56.76
		W	...	21 45 38.0	2 54.8	49.25	49.50	.....	237 48 32.25	+ 2.40	-17.12	+ 22.95	
4	134 G. Capricorni	W	...	21 50 21.0	3 4.2	48.35	49.05	.....	155 30 43.18	+ 1.97	+15.37	-1 41.44	-21 38 27.13
		E	...	21 55 23.0	1 57.8	49.50	50.50	.....	276 35 6.40	+ 3.15	- 6.28	+1 41.43	
5	28 Pegasi	E	...	22 2 59.0	3 2.0	50.70	50.90	.....	234 28 1.70	+ 3.34	-41.68	+ 19.15	+20 30 35.57
		W	...	22 9 1.0	3 0.0	48.30	49.15	.....	197 37 56.25	+ 2.42	+40.76	- 19.15	
6	47 Aquarii	W	...	22 13 16.0	3 5.2	48.00	48.90	.....	155 4 28.20	+ 1.70	+15.42	-1 43.26	-22 4 44.56
		E	...	22 19 21.0	2 59.8	50.40	50.45	.....	277 1 32.25	+ 3.55	-14.53	+1 43.26	
7	υ Aquarii	E	...	22 26 23.0	3 6.3	51.40	50.65	.....	276 8 48.50	+ 3.69	-15.84	+1 39.69	-21 11 57.79
		W	...	22 32 31.0	3 1.7	49.35	49.35	.....	155 57 9.18	+ 2.56	+15.06	-1 39.70	
8	94 H ¹ . Aquarii	W	...	22 46 8.0	4 7.1	46.30	47.95	.....	171 38 10.35	+ 0.62	+36.84	- 56.44	- 5 29 52.76
		E	...	22 53 8.0	2 52.9	51.15	50.60	.....	260 27 28.02	+ 3.84	-18.04	+ 56.43	
9	October 31, H. 32 H. Cephei	E	...	22 18 4.0	3 12.1	53.55	51.60	.....	160 21 24.15	+ 2.05	+ 1.64	-1 0.46	+85 37 48.44
		W	...	22 24 2.0	2 45.9	51.10	50.30	.....	262 44 31.30	+ 0.41	- 1.22	+1 0.46	
10	κ Aquarii	W	...	22 29 45.0	3 2.2	51.10	50.15	.....	172 24 58.98	+ 0.48	+20.34	- 54.28	- 4 43 17.66
		E	...	22 35 46.0	2 58.8	52.90	51.25	.....	259 40 57.92	+ 1.56	-19.59	+ 54.28	
11	November 2, H. ζ Delphini	E	...	20 28 45.0	2 3.8	52.35	51.85	.....	240 37 11.25	+ 4.51	-15.16	+ 25.90	+14 20 50.34
		W	...	20 34 47.0	3 58.2	49.40	50.05	.....	191 28 0.98	+ 2.67	+56.10	- 25.90	
12	19 Capricorni	W	...	20 47 18.0	2 3.8	47.70	49.75	.....	158 51 55.08	+ 2.29	+ 7.34	-1 27.81	-18 17 8.42
		E	...	20 53 20.0	3 58.2	50.60	51.25	.....	273 14 23.00	+ 3.43	-27.19	+1 27.82	
13	γ Equulei	E	...	21 3 40.0	2 0.1	51.85	51.75	.....	245 12 59.78	+ 4.25	-12.38	+ 31.69	+ 9 44 54.85
		W	...	21 9 38.0	3 57.9	48.30	49.70	.....	186 52 20.90	+ 1.97	+48.56	- 31.71	
14	B. A. C. 7504	W	...	21 17 30.0	1 31.6	47.60	49.65	.....	263 45 30.22	+ 2.09	- 0.28	+1 2.46	+86 38 49.48
		E	...	21 22 31.0	3 29.4	50.05	51.20	.....	168 20 26.60	+ 3.25	+ 1.47	-1 2.46	
15	41 Capricorni	E	...	21 34 33.0	1 59.3	50.50	51.25	.....	278 38 17.95	+ 3.37	- 6.23	+1 40.26	-23 41 47.42
		W	...	21 40 27.0	3 54.7	47.95	49.65	.....	153 27 19.25	+ 2.13	+24.10	-1 49.30	
16	Bradley 2868	W	...	21 47 51.0	2 2.9	46.85	49.00	.....	232 53 33.18	+ 1.56	-12.45	+ 17.29	+55 45 55.56
		E	...	21 53 53.0	3 59.1	48.80	50.60	.....	199 11 49.00	+ 3.00	+47.07	- 17.30	
17	ν Pegasi	E	...	21 58 48.0	2 2.3	49.90	51.00	.....	250 22 17.40	+ 3.07	-11.22	+ 38.90	+ 4 35 30.18
		W	...	22 4 47.0	3 56.7	47.25	49.10	.....	181 43 10.50	+ 1.60	+42.01	- 38.92	
18	29 H. Camelop. S. P.	W	...	22 13 43.0	1 51.1	46.55	48.45	.....	272 22 11.22	+ 0.78	+ 0.58	+1 25.40	+84 44 7.18
		E	...	22 19 42.0	4 7.9	48.95	50.30	.....	159 43 51.20	+ 2.91	- 2.88	-1 25.40	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
21 21 19	56.0	...	...							1	216 3 1.24	...
21 21 28	55.2	...	...							2	...	0.46
21 21 35	...	58.5	29.991							3	...	0.40
21 21 43	55.1	...	...							4	...	0.89
21 21 53	54.9	...	...							5	...	1.40
22 2 6	55.0	...	...							6	...	3.30
22 2 16	55.0	57.5	30.000							7	...	1.57
22 2 29	54.9	...	...							8	...	0.81
22 2 50	53.8	...	...							9	216 2 59.16	-36.90
22 2 57	...	56.5	30.008							10	...	59.84
31 22 12	...	60.0	30.012							11	216 3 0.18	-28.17
22 22 21	59.1	...	...							12	...	1.98
22 22 33	59.8	...	...							13	...	1.53
22 22 43	...	60.0	30.016							14	...	1.68
2 20 20	65.0	...	29.978							15	...	0.26
20 20 31	61.8	...	...							16	...	0.68
20 20 41	...	63.5	29.974							17	...	1.67
20 20 49	60.9	...	...							18	...	1.90
21 21 6	60.6	...	...							
21 21 19	59.9	...	...							
21 21 25	...	62.5	29.974									
21 21 36	59.7	...	...							
21 21 50	57.9	...	...							
22 2 1	58.7	...	...							
22 2 16	57.8	60.5	29.969									

Notes.

9-10. Clock correction uncertain.
11-18. Clock time increased 1^m.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	9 H. Draconis S. P.	E		22 24 56.0	1 55.8	49.10	50.50		151 12 29.10	+ 2.64	- 1.50	- 2 1.01	+ 76 12 12.36
		W		22 30 52.0	4 0.2	47.10	49.25		280 53 22.05	+ 1.69	+ 6.46	+ 2 0.98	
2	67 Aquarii	W		22 36 11.0	2 2.6	46.30	48.60		100 40 43.12	+ 0.93	+ 8.73	- 59.85	- 7 27 52.02
		E		22 42 10.0	3 56.4	49.00	50.40		262 25 39.98	+ 2.92	- 32.47	+ 59.85	
3	94 H. Aquarii	E		22 48 12.0	2 0.3	49.85	50.70		260 27 10.02	+ 3.23	- 8.73	+ 55.97	- 5 29 53.12
		W		22 54 8.0	3 55.7	46.55	48.30		171 38 12.58	+ 0.71	+ 33.52	- 55.99	
4	55 Pegasi	W		23 0 9.0	2 1.4	45.95	48.50		186 1 40.52	+ 1.08	+ 12.35	- 33.06	+ 8 53 36.02
		E		23 6 8.0	3 57.6	49.45	50.65		246 4 53.45	+ 2.94	- 47.28	+ 33.07	
5	43 Aquarii	E		23 11 56.0	2 2.3	49.50	50.65		265 5 23.68	+ 3.11	- 8.27	+ 1 5.85	- 10 8 5.46
		W		23 17 57.0	3 58.7	47.25	48.95		167 0 13.25	+ 1.24	+ 31.51	- 1 5.86	
6	November 3, H. G. Microscopii	W		20 31 14.0	3 3.4	44.85	48.40		143 24 11.40	+ 0.61	+ 12.43	- 2 57.82	- 33 46 18.19
		E		20 37 19.0	3 1.6	47.65	50.65		288 41 47.72	+ 2.97	- 12.19	+ 2 57.80	
7	76 Draconis	E		20 46 40.0	2 57.6	48.35	50.05		172 48 5.38	+ 2.45	+ 2.66	- 52.96	+ 82 10 59.31
		W		20 52 37.0	2 59.4	46.40	48.90		259 17 50.85	+ 1.76	- 2.71	+ 52.96	
8	4 Capricorni	W		20 58 29.0	3 0.9	46.00	48.85		151 46 3.78	+ 1.14	+ 13.92	- 1 56.45	- 25 23 21.34
		E		21 4 30.0	3 0.1	48.10	50.30		280 19 52.78	+ 2.90	- 13.80	+ 1 56.44	
9	B. A. C. 7504	E		21 10 30.0	2 31.0	48.80	50.50		168 20 27.12	+ 2.00	+ 0.77	- 1 2.01	+ 86 38 48.89
		W		21 21 30.0	2 29.0	46.50	49.25		263 45 30.12	+ 1.80	- 0.74	+ 1 2.01	
10	358 B. Cygni	W		21 25 29.0	2 45.4	46.25	48.90		220 20 7.75	+ 1.26	- 30.96	+ 13.36	+ 52 12 7.25
		E		21 31 11.0	2 56.6	47.65	49.95		202 45 45.65	+ 2.62	+ 35.29	+ 13.36	
11	11 Cephei	E		21 37 30.0	3 3.0	49.00	49.85		184 6 8.00	+ 2.57	+ 8.79	- 35.25	+ 70 52 30.52
		W		21 43 32.0	2 59.0	46.30	49.30		247 50 44.05	+ 1.89	- 8.42	+ 35.24	
12	13 Cephei	W		21 48 38.0	3 2.4	46.40	49.20		233 17 35.35	+ 1.84	- 26.52	+ 17.57	+ 56 9 44.62
		E		21 54 39.0	2 58.6	47.50	49.95		198 48 22.25	+ 2.21	+ 25.42	- 17.58	
13	28 Pegasi	E		22 2 55.0	3 2.9	48.60	50.55		234 28 1.42	+ 2.75	- 42.09	+ 18.86	+ 20 30 35.99
		W		22 8 58.0	3 0.1	46.30	48.65		197 37 56.05	+ 1.62	+ 40.81	- 18.86	
14	30 H. Camelop. S. P.	W		22 16 18.0	2 57.8	46.20	48.90		274 3 30.58	+ 1.64	+ 1.92	+ 1 30.54	+ 83 2 31.41
		E		22 22 18.0	3 2.2	48.55	49.85		158 2 19.85	+ 2.49	- 2.01	- 1 30.54	
15	226 B. Cephei	E		22 27 34.0	3 5.4	48.80	50.10		170 14 30.88	+ 2.76	+ 6.00	- 42.42	+ 75 44 12.11
		W		22 33 34.0	2 54.6	46.40	48.80		252 51 18.48	+ 1.56	- 5.32	+ 42.42	
16	7 Piscis Australis	W		22 44 6.0	3 5.1	46.55	48.55		143 47 16.10	+ 1.48	+ 12.74	- 2 55.70	- 33 23 9.51
		E		22 50 10.0	2 58.9	48.10	50.10		288 18 40.62	+ 2.55	- 11.90	+ 2 55.68	
17	4 Aquarii	E		22 58 28.0	2 43.8	49.40	51.05		279 12 21.60	+ 3.33	- 11.63	+ 1 52.01	- 24 15 43.38
		W		23 4 30.0	3 18.2	47.10	48.95		152 53 38.28	+ 1.95	+ 17.03	- 1 52.02	
18	November 4, H. H. Draconis S. P.	W		21 21 18.0	2 3.4	44.60	47.75		275 21 31.70	+ 1.20	+ 1.08	+ 1 34.02	+ 81 44 43.47
		E		21 25 19.0	1 57.6	48.35	49.95		156 44 40.02	+ 3.31	- 0.98	- 1 34.01	
19	Piscis Australis	E		21 36 12.0	3 1.6	48.25	50.10		288 23 30.95	+ 3.54	- 12.25	+ 2 53.93	- 33 27 52.17
		W		21 42 22.0	3 8.4	45.45	47.75		143 42 37.90	+ 1.35	+ 13.18	- 2 53.91	

Time	Ther- (°C)	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red to 1903.0.
<i>h m s</i>			<i>mm</i>					<i>° ' "</i>	<i>"</i>
2 20 27	57.5						1	216 3	0.20
20 28	57.8						2		1.60
20 30	57.1	60.0	29.964				3		0.60
21 2	56.8						4		1.54
21 14	56.7						5		2.20
21 21		59.0	29.960				6		1.46
21 26		62.0	29.946				7		0.20
21 34	65.3						8		0.18
21 50	64.1						9		1.02
21 1	64.1	66.0	29.950				10		0.80
21 19	63.0						11	216 3	58.88
21 28	62.6	64.0	29.950				12	216 3	0.27
21 41	62.7						13		0.28
21 52	61.9						14		1.74
22 0		64.0	29.952				15		1.68
22 6	62.0						16		0.58
22 19	61.0						17		0.58
22 31	60.9	63.5	29.950				18		8.22
22 47	60.0						19		7.44
23 1	59.0								
23 8		61.0	29.952						
23 16		60.5	29.942						
23 21	61.0								
23 39	61.2	65.0	29.946						

Note.

1-5 Clock time increased 1m

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	158 B. Cephei	W E		21 48 38.0 21 54 38.0	3 5.0 2 55.0	44.10 48.40	47.50 49.80	.....	250 22 34.50 181 43 38.35	+ 0.79 + 3.48	- 7.42 + 6.64	+ 38.24 - 38.24	+73 15 14.59
2	μ Piscis Australis	E W		21 59 48.0 22 5 53.0	2 59.0 3 6.0	48.65 45.55	50.05 47.65	.....	288 23 7.38 143 43 2.78	+ 3.54 + 1.43	- 11.90 + 12.85	+2 54.07 -2 54.05	-33 27 28.3
3	ρ Aquarii	W E		22 12 10.0 22 18 6.0	2 59.2 2 56.8	44.00 47.75	47.50 50.05	.....	168 50 24.35 263 15 43.95	+ 0.71 + 3.42	+ 18.37 - 17.88	-1 0.50 +1 0.50	- 8 18 6.88
4	β Piscis Australis	E W		22 23 0.0 22 29 0.0	3 3.0 2 57.0	48.40 45.70	50.30 48.00	.....	287 46 6.68 144 20 1.98	+ 3.36 + 1.40	- 12.57 + 11.76	+2 47.99 -2 47.97	-32 50 22.49
5	67 Aquarii	W E		22 35 10.0 22 41 13.0	3 3.9 2 59.1	46.50 48.05	47.85 50.20	.....	169 40 35.72 262 25 33.30	+ 1.70 + 3.54	+ 19.66 - 18.64	- 58.82 + 58.82	- 7 27 52.73
6	52 Pegasi	E W		22 51 24.0 22 58 47.0	3 0.4 4 22.6	50.00 45.10	50.50 48.00	.....	243 45 14.92 188 20 22.65	+ 4.21 + 1.29	- 29.14 + 1.73	+ 29.48 - 29.48	+11 13 5.01
7	δ^1 Aquarii	E W		23 14 43.0 23 20 54.0	3 13.3 2 57.7	48.25 45.25	50.30 47.90	.....	275 34 33.28 156 31 41.02	+ 3.41 + 1.60	- 17.21 + 14.55	+1 35.22 -1 35.19	-20 37 29.71
8	δ^3 Aquarii	W E		23 25 11.0 23 31 12.0	3 4.8 2 56.2	44.25 48.15	47.65 50.30	.....	155 42 29.38 276 23 41.02	+ 0.89 + 3.64	+ 15.52 - 14.11	-1 38.36 +1 38.32	-21 26 44.07
9	19 Piscium Nov. 6, H.	E W		23 38 27.0 23 44 30.0	3 3.0 3 0.0	49.65 45.65	50.60 48.05	.....	252 0 45.02 180 5 26.70	+ 4.04 + 1.74	- 24.22 + 23.43	+ 40.73 - 40.71	+ 2 57 19.45
10	7 Aquarii	E W		20 48 41.0 20 54 41.0	3 1.7 2 58.3	63.25 61.75	50.05 49.00	.....	265 1 19.65 167 4 50.15	+ 2.41 + 1.30	- 18.28 + 17.60	+1 8.23 -1 8.21	-10 3 48.93
11	γ Equulei	W E		21 2 37.0 21 8 37.0	3 3.5 2 56.5	48.45 51.25	47.95 50.05	.....	186 52 48.95 245 13 20.52	+ 0.42 + 2.42	+ 28.89 - 26.73	- 33.17 + 33.17	+ 9 44 54.51
12	B. A. C. 7504	E W		21 16 30.0 21 21 31.0	2 30.6 2 30.4	51.05 49.95	49.45 49.75	.....	168 20 36.72 263 45 33.50	+ 1.89 + 1.92	+ 0.76 - 0.76	-1 5.40 +1 5.40	+86 38 49.69
13	ϵ Piscis Australis	W E		21 36 12.0 21 42 12.0	3 1.6 2 58.4	48.90 50.25	49.10 50.05	.....	143 42 50.68 288 23 22.05	+ 1.12 + 2.12	+ 12.25 - 11.82	-3 5.23 +3 5.26	-33 27 52.75
14	134 G. Capricorni	E W		21 50 20.0 21 56 23.0	3 2.7 3 0.3	51.80 50.50	50.25 49.05	.....	276 35 17.45 155 30 52.70	+ 2.68 + 1.60	- 15.12 + 14.72	+1 45.34 -1 45.34	-21 38 26.69
15	24 Cephei	W E		22 4 55.0 22 10 55.0	3 6.0 2 54.0	48.80 50.40	48.85 49.95	.....	248 59 45.58 183 6 28.00	+ 1.19 + 1.90	- 8.40 + 7.35	+ 38.68 - 38.69	+71 52 25.89
16	ζ Aquarii (<i>mean</i>)	E W		22 20 57.0 22 26 55.0	2 56.9 3 1.1	51.55 50.25	50.20 48.90	.....	255 28 26.05 176 37 43.50	+ 2.37 + 1.65	- 20.91 + 21.91	+ 49.09 - 49.09	- 0 30 32.67
17	\ast Piscis Australis	W E		22 32 17.0 22 38 23.0	3 4.1 3 1.9	49.50 50.80	48.70 49.95	.....	149 37 11.08 282 28 59.00	+ 1.19 + 2.14	+ 13.91 - 13.58	-2 16.26 +2 16.28	-27 32 40.31
18	γ Piscis Australis	E W		22 44 7.0 22 50 8.0	3 4.7 2 56.3	52.15 50.35	50.35 48.95	.....	288 18 37.25 143 47 34.20	+ 2.67 + 1.60	- 12.69 + 11.56	+3 4.97 -3 4.97	-33 23 8.23
19	ϵ^1 Aquarii	W E		22 59 3.0 23 4 29.0	2 9.6 3 16.4	48.90 50.45	48.40 49.75	.....	152 53 54.05 279 12 22.62	+ 1.05 + 1.79	+ 7.28 - 16.72	-1 57.72 +1 57.74	-24 15 43.73
20	γ Sculptoris	E W		23 10 36.0 23 16 40.0	3 2.9 3 1.1	51.45 49.95	49.75 48.85	.....	287 58 54.08 144 7 15.70	+ 2.22 + 1.43	- 12.51 + 12.27	+3 1.70 -3 1.70	-33 3 22.25

Time.	Ther. 3882.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>c</i>		<i>in.</i>			<i>° ' "</i>	
4 21 52	63.1				1	216 3 8.17	
22 3	63.0				2	8.05	13.97
22 15	62.9	65.0	29.726		3	6.46	22.53
22 26	62.7				4	6.32	14.45
22 38	62.3	64.5	29.716		5	7.64	22.75
22 55	62.0				6	7.83	28.04
23 18	61.2	63.5	29.698		7	8.34	18.34
23 28	61.1				8	8.15	18.01
23 41	60.9	63.0	29.644		9	8.36	24.36
6 20 52	37.0	40.0	29.874		10	6.42	20.74
21 6	37.0				11	7.24	27.82
21 14		39.5	29.874		12	7.02	
21 19	36.0				13	8.22	11.40
21 39	35.8				14	7.02	17.74
21 47		38.5	29.883		15	7.80	
21 53	35.1				16	7.28	25.02
22 8	35.0				17	6.88	
22 15		37.5	29.888		18	7.32	14.25
22 24	34.9				19	5.04	17.13
22 35	34.7				20	6.59	
22 47	34.6	37.0	29.898				
23 2	34.3						
23 14	34.1						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>1</i>	<i>° ' "</i>	<i>"</i>	<i>° ' "</i>	<i>"</i>	<i>° ' "</i>
1	1 H. Cassiopeiae	W		23 22 50.0	2 48.5	49.05	48.45		235 9 13.40	+ 0.94	-19.52	+ 20.74	+58 1 25.09
		E		23 28 43.0	3 4.5	50.05	49.85		196 56 53.75	+ 2.28	+23.40	- 20.74	
2	2 Piscium	E		23 34 7.0	3 2.7	52.30	50.35		253 42 47.25	+ 2.75	-23.17	- 46.25	+ 1 15 10.95
		W		23 40 8.0	2 58.3	50.15	48.75		178 23 24.40	+ 1.40	+22.07	- 46.25	
3	November 7. H. Groombridge 1391 S. P.	E		20 4 55.0	1 3.9	49.20	49.50		157 43 19.08	+ 1.05	- 0.20	- 1 30.11	+82 43 21.19
		W		20 9 0.0	3 1.1	49.05	50.00		274 22 49.48	+ 1.33	+ 2.07	- 1 30.11	
4	Groombridge 3212	W		20 12 26.0	1 2.1	50.10	49.75		261 30 36.80	+ 1.31	- 0.22	- 1 0.38	+84 23 47.76
		E		20 17 9.0	3 40.9	49.10	49.05		170 35 32.75	+ 0.84	+ 2.84	- 1 0.38	
5	75 Draconis	W		20 33 29.0	0 49.9	49.40	49.50		258 13 0.88	+ 1.05	- 0.24	- 53.91	+81 6 5.11
		E		20 37 53.0	3 34.1	49.00	49.10		173 53 7.35	+ 0.76	+ 4.49	- 53.91	
6	Groombridge 1480 S. P.	E		20 54 12.0	2 38.8	49.25	49.40		156 12 35.18	+ 0.88	- 1.89	- 1 41.30	+81 12 28.38
		W		20 59 17.0	2 26.2	49.70	49.95		275 53 38.42	+ 1.48	+ 1.60	- 1 41.31	
7	98 B. Cephei	W		21 5 35.0	1 53.1	49.50	49.65		254 51 41.88	+ 1.28	- 1.84	+ 47.97	+77 44 39.47
		E		21 9 1.0	1 32.9	49.70	49.95		177 14 29.10	+ 1.27	+ 1.24	- 47.97	
8	1 H. Draconis S. P.	E		21 21 3.0	2 18.5	49.40	49.75		156 44 46.85	+ 1.12	- 1.36	- 1 40.27	+81 44 42.51
		W		21 26 25.0	3 3.5	49.35	50.35		275 21 23.85	+ 1.52	+ 2.38	- 1 40.27	
9	11 Cephei	W		21 38 16.0	2 16.8	50.45	50.40		247 59 48.90	+ 1.95	- 4.92	+ 37.21	+70 52 32.91
		E		21 43 12.0	2 39.2	50.00	49.00		184 6 20.00	+ 1.16	+ 6.66	- 37.21	
10	13 Cephei	E		21 48 38.0	3 2.4	50.05	49.75		198 48 26.40	+ 1.26	+26.52	- 18.54	+56 9 46.25
		W		21 55 2.0	3 21.6	50.85	50.25		233 17 46.68	+ 2.00	-32.38	+ 18.54	
11	9 Aquarii	E		22 12 45.0	2 23.6	51.75	50.50		263 15 36.05	+ 2.37	-11.80	+ 1 4.52	- 8 18 7.61
		W		22 18 6.0	2 57.4	51.30	49.70		168 50 27.52	+ 1.63	+18.00	- 1 4.52	
12	9 Aquarii	W		22 26 26.0	3 0.3	49.25	49.30		155 57 17.52	+ 0.96	+14.83	- 1 43.59	-21 12 0.29
		E		22 32 22.0	2 55.7	51.55	50.45		276 8 51.95	+ 2.14	-14.09	+ 1 43.59	
13	94 H. Aquarii	E		22 47 12.0	3 0.1	52.80	51.00		260 27 35.40	+ 2.94	-19.58	+ 58.52	- 5 29 53.55
		W		22 54 1.0	3 48.9	50.60	49.00		171 38 22.70	+ 1.07	+31.62	- 58.52	
14	Groombridge 1391	W		8 2 22.0	3 36.9	48.55	48.00		250 50 15.12	+ 0.40	- 3.65	+ 57.95	+82 43 19.18
		E		8 7 23.0	1 24.1	51.95	49.90		172 15 59.45	+ 2.78	+ 0.55	- 57.95	
15	Groombridge 3212 S. P.	E		8 11 7.0	2 20.9	51.65	49.40		159 23 43.00	+ 2.39	- 0.98	- 1 31.74	+84 23 48.16
		W		8 15 24.0	1 56.1	49.50	48.35		272 42 29.65	+ 1.00	+ 0.67	+ 1 31.76	
16	Groombridge 3260 S. P.	W		8 21 47.0	2 5.2	49.00	48.10		272 51 21.10	+ 0.87	+ 0.80	+ 1 32.31	+84 14 56.27
		E		8 26 55.0	3 2.8	51.30	49.25		159 14 52.85	+ 2.05	- 1.70	- 1 32.30	
17	75 Draconis S. P.	E		8 32 21.0	1 57.7	51.35	49.30		156 6 13.38	+ 1.90	- 1.05	- 1 44.31	+81 6 5.17
		W		8 36 45.0	2 26.3	49.45	48.50		275 50 59.08	+ 1.34	+ 1.02	+ 1 44.32	
18	Groombridge 1480	W		8 54 45.0	2 5.8	49.05	48.25		258 10 22.98	+ 0.96	- 1.53	+ 55.00	+81 12 26.50
		E		8 59 16.0	2 25.2	51.10	49.15		173 46 48.70	+ 1.93	+ 2.04	- 54.99	

Time	Ther- m.	Atm- ther.	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903 o.
2 5 30	11.0	16.5	10.910		1	216 3 7.12	-34.82
6 11 15	11.7	16.9	10.910		2	7.48	-24.03
7 15 0	12.0	17.0	10.944		3	6.82	-14.87
12 15 0	12.5				4	7.10	-10.74
15 15 0	12.5				5	7.11	-8.00
16 15 0	12.5	17.0	10.944		6	7.81	-17.04
17 15 0	12.5				7	6.40	
18 15 0	12.5				8	7.18	
19 15 0	12.5	17.0	10.946		9	6.88	
20 15 0	12.5				10	6.41	-38.61
21 15 0	12.5				11	6.88	-22.45
22 15 0	12.5	17.0	10.910		12	6.66	-18.08
23 15 0	12.5				13	7.08	-21.11
24 15 0	12.5				14	7.47	-13.80
25 15 0	12.5	17.0	10.947		15	7.88	-10.71
26 15 0	12.5				16	7.99	-17.11
27 15 0	12.5	17.0	10.947		17	8.17	-18.02
28 15 0	12.5	17.0	10.960		18	7.54	-17.09
29 15 0	12.5						
30 15 0	12.5						
31 15 0	12.5						
32 15 0	12.5						
33 15 0	12.5						
34 15 0	12.5						
35 15 0	12.5						
36 15 0	12.5						
37 15 0	12.5						
38 15 0	12.5						
39 15 0	12.5						
40 15 0	12.5						
41 15 0	12.5						
42 15 0	12.5						
43 15 0	12.5						
44 15 0	12.5						
45 15 0	12.5						
46 15 0	12.5						
47 15 0	12.5						
48 15 0	12.5						
49 15 0	12.5						
50 15 0	12.5						
51 15 0	12.5						
52 15 0	12.5						
53 15 0	12.5						
54 15 0	12.5						
55 15 0	12.5						
56 15 0	12.5						
57 15 0	12.5						
58 15 0	12.5						
59 15 0	12.5						
60 15 0	12.5						

Notes

10 W Clock time increased 10"

11 Clouds

15 W One microscope reading decreased 10"

18 W One microscope reading increased 10"

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>''</i>	<i>° ' ''</i>	<i>''</i>	<i>''</i>	<i>' ''</i>	<i>° ' ''</i>
1	November 8, H. Groombridge 1391 S. P.	E W	...	20 3 3.0 20 11 18.0	2 55.9 5 19.1	52.00 55.50	48.65 51.05	...	157 43 22.52 274 22 46.18	+ 2.83 + 4.95	- 1.95 + 6.44	- 1 34.78 + 1 34.79	+82 43 21.49
2	Groombridge 3260	W E	...	20 22 5.0 20 26 15.0	1 46.9 2 23.1	49.70 47.10	50.45 48.10	...	261 21 43.15 170 44 27.85	+ 3.07 + 0.86	- 0.68 + 1.22	+ 59.32 - 59.32	+84 14 53.76
3	75 Draconis	E W	...	20 32 17.0 20 36 41.0	2 1.6 2 22.4	45.95 49.15	48.05 50.00	...	173 53 11.88 258 13 3.15	+ 0.65 + 2.55	- 1.45 - 1.99	- 53.19 + 53.19	+81 6 4.70
4	Groombridge 1480 S. P.	W E	...	20 54 45.0 20 59 8.0	2 5.7 2 17.3	48.20 46.95	49.25 48.50	...	275 53 38.20 156 12 34.18	+ 2.01 + 1.03	- 1.18 - 1.41	+ 1 41.00 - 1 41.00	+81 12 28.57
5	98 B. Cephei	E W	...	21 4 0.0 21 9 2.0	3 27.8 1 34.2	46.70 48.15	47.00 49.25	...	177 14 27.48 254 51 40.90	+ 0.64 + 2.00	+ 6.20 - 1.27	- 47.39 + 47.39	+77 44 37.68
6	b Capricorni	W E	...	21 20 20.0 21 26 23.0	2 54.1 3 8.9	47.75 46.95	48.05 48.75	...	154 55 53.85 277 10 21.52	+ 1.79 + 1.11	+ 13.60 - 10.00	- 1 46.67 + 1 46.68	-22 13 28.73
7	c Piscis Australis	E W	...	21 36 10.0 21 42 7.0	3 2.8 2 54.2	47.35 49.35	49.30 49.40	...	288 23 23.10 143 42 50.05	+ 1.72 + 2.26	- 12.41 + 11.27	+ 3 3.60 - 3 3.67	-33 27 51.46
8	Bradley 2868	W E	...	21 46 58.0 21 52 55.0	2 55.4 3 1.6	47.40 46.95	49.10 48.90	...	232 53 53.82 199 12 17.10	+ 1.75 + 1.16	- 25.33 + 27.16	+ 17.91 - 17.91	+55 45 56.96
9	v Pegasi	E W	...	21 57 47.0 22 3 48.0	3 2.9 2 58.1	47.85 48.15	49.25 48.95	...	250 22 36.52 181 43 37.42	+ 1.68 + 1.85	- 25.09 + 23.79	+ 40.37 - 40.36	+ 4 35 31.25
10	47 Aquarii	W E	...	22 13 19.0 22 19 18.0	2 58.9 3 0.1	46.45 47.55	48.15 49.00	...	155 4 36.48 277 1 37.32	+ 0.72 + 1.69	+ 14.39 - 14.58	- 1 46.10 + 1 46.11	-22 4 45.88
11	Groombridge 1391	E W	...	8 3 34.0 8 8 19.0	2 24.9 2 20.1	48.65 48.25	48.95 48.95	...	172 15 58.50 259 50 12.18	+ 0.72 + 0.43	+ 1.63 - 1.52	- 57.76 + 57.76	+82 43 19.52
12	Groombridge 3260 S. P.	W E	...	8 21 16.0 8 26 20.0	2 35.7 2 28.3	48.00 49.15	48.55 48.45	...	272 51 21.60 159 14 51.65	+ 0.26 + 0.53	+ 1.23 - 1.12	+ 1 31.93 - 1 31.92	+84 14 55.42
13	75 Draconis S. P.	E W	...	8 32 20.0 8 36 56.0	1 58.4 2 37.6	48.50 48.25	48.45 49.00	...	156 6 13.78 275 59 58.10	+ 0.27 + 0.62	- 1.06 + 1.88	- 1 43.88 + 1 43.88	+81 6 5.68
14	Groombridge 1480	W E	...	8 54 31.0 8 59 13.0	2 20.1 2 21.9	48.50 48.75	48.85 48.75	...	258 19 22.10 173 46 49.28	+ 0.56 + 0.54	- 2.90 + 1.95	+ 54.78 - 54.78	+81 12 25.42
15	November 9, H. Groombridge 3260	E W	...	20 21 40.0 20 26 30.0	2 11.5 2 38.5	49.00 48.50	49.30 49.20	...	170 44 24.48 261 21 45.98	+ 1.66 + 1.77	+ 1.04 - 1.50	- 58.22 + 58.22	+84 14 54.40
16	75 Draconis	W E	...	20 31 56.0 20 36 46.0	2 22.2 2 27.8	48.95 49.60	48.85 48.75	...	258 13 3.65 173 53 7.85	+ 1.57 + 1.75	- 1.98 + 2.14	+ 52.24 - 52.24	+81 6 4.63
17	B. D. +83° 233 S. P.	E W	...	20 42 41.0 20 47 31.0	2 31.4 2 18.6	49.20 48.25	48.65 48.80	...	158 6 17.02 273 59 54.08	+ 1.37 + 1.54	- 1.38 + 1.15	- 1 31.99 + 1 32.00	+83 6 21.48
18	Groombridge 1480 S. P.	W E	...	20 54 20.0 20 59 10.0	2 30.7 2 19.3	48.55 49.50	48.75 48.95	...	275 53 40.22 156 12 31.22	+ 1.55 + 1.66	+ 1.70 - 1.46	+ 1 39.28 - 1 39.28	+81 12 28.06

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>		<i>in.</i>									<i>° ' ''</i>	<i>''</i>
8 19 59	...	50.5	30.090								1	216 3 10.49	+34.89
20 7	46.9	...	...								2	7.74	-37.33
20 24	46.0	...	...								3	8.84	-38.03
20 34	45.9	...	...								4	7.60	+37.14
20 41	...	48.5	30.088								5	7.98	...
20 57	45.0	...	...								6	7.94	-17.05
21 7	44.3	...	...								7	8.00	-13.38
21 15	...	47.0	30.083								8	7.81	-38.69
21 24	43.5	...	...								9	8.09	-26.74
21 39	42.9	...	...								10	8.02	-17.68
21 50	42.7	48.5	30.082								11	8.97	+34.88
22 1	42.0	...	...								12	7.08	-37.44
22 16	43.3	...	...								13	6.80	-38.04
22 23	...	45.0	30.084								14	8.76	+37.19
7 58	...	35.5	30.034								15	6.72	-37.34
8 6	32.8	...	...								16	7.49	-38.04
8 24	32.9	...	...								17	6.90	+37.09
8 35	32.9	36.0	30.034								18	7.44	+37.24
8 57	32.9	...	...								
9 3	...	35.0	30.034										
9 20 18	...	55.0	29.951										
20 24	53.0	...	...								
20 34	52.4	...	...								
20 45	51.9	54.5	29.944										
20 57	51.1	...	...								

Note.

3 E, 9 E, 11 W. One microscope reading decreased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	98 B. Cephei	E		21 4 39.0	2 48.5	49.50	49.00	.....	177 14 27.45	+ 1.67	+ 4.08	+ 46.54	+77 44 37.60
		W		21 9 40.0	2 12.5	49.25	49.15	.....	254 51 42.60	+ 1.97	- 2.52	+ 46.54	
2	1 H. Draconis S. P.	W		21 20 53.0	2 28.4	49 10	49.10	.....	275 21 28.25	+ 1.83	+ 1.56	+ 37.22	+81 44 42.05
		E		21 25 43.0	2 21.6	49.85	48.55	.....	156 44 43.25	+ 1.62	- 1.42	- 37.21	
3	2 Cephei	E		21 39 39.0	3 2.2	50.25	49.50	.....	194 17 23.20	+ 2.38	+18.60	+ 23.14	+60 41 0.83
		W		21 45 39.0	2 57.8	49.50	48.45	.....	237 48 42.52	+ 1.47	-17.71	+ 23.14	
4	7 Piscis Australis	W		21 52 16.0	3 2.4	48.50	48.25	.....	148 15 3.38	+ 1.15	+13.34	- 2 21.21	-28 54 53.67
		E		21 58 18.0	2 59.6	49.15	49.15	.....	283 51 7.22	+ 1.79	-12.94	+ 2 21.21	
5	28 Pegasi	E		22 2 57.0	3 0.5	49.55	49.35	.....	234 28 6.40	+ 1.76	-40.98	+ 19.32	+20 30 35.33
		W		22 8 58.0	3 0.5	48.55	48.30	.....	197 38 1.28	+ 0.94	+40.98	- 19.32	
6	31 Pegasi	W		22 13 47.0	3 0.1	47.40	48.10	.....	188 51 18.08	+ 0.79	+29.48	- 29.82	+11 43 28.22
		E		22 19 56.0	3 8.9	49.60	49.30	.....	243 14 56.00	+ 1.96	-32.43	+ 29.83	
7	2 Aquarii	E		22 26 25.0	3 0.8	50.10	49.85	.....	276 8 53.78	+ 2.38	-14.91	+ 40.93	-21 11 59.44
		W		22 32 24.0	2 58.2	49.10	48.65	.....	155 57 14.88	+ 1.57	+14.49	- 40.92	
8	67 Aquarii	W		22 36 12.0	2 1.0	48.75	48.05	.....	169 40 49.72	+ 1.07	+ 8.51	- 1 1.01	- 7 27 51.14
		E		22 41 16.0	3 3.0	49.05	49.10	.....	262 25 30.48	+ 1.83	-19.46	+ 1 1.01	
9	52 Pegasi	E		22 51 24.0	2 59.4	50.95	49.55	.....	243 45 13.85	+ 2.58	-28.82	+ 30.63	+11 13 5.14
		W		22 57 27.0	3 3.6	48.90	48.30	.....	188 20 54.40	+ 1.26	+30.19	- 30.61	
10	Groombridge 3212 S. P.	W		8 11 9.0	2 18.0	47.00	50.40	.....	272 42 31.52	+ 0.00	+ 0.94	+ 29.46	+84 23 48.78
		E		8 15 59.0	2 32.0	47.20	50.75	.....	159 23 43.18	+ 0.16	- 1.14	- 29.45	
11	November 10. H. Groombridge 3212	E		20 10 52.0	2 35.0	51.20	51.55	.....	170 35 29.70	+ 2.08	+ 1.40	- 57.51	+84 23 46.50
		W		20 15 45.0	2 18.0	52.10	51.50	.....	261 30 36.80	+ 2.19	- 1.11	+ 57.51	
12	Groombridge 3260	W		20 21 41.0	2 10.2	52.65	51.15	.....	261 21 44.65	+ 2.38	- 1.01	+ 57.27	+84 14 53.71
		E		20 26 29.0	2 37.8	50.85	50.20	.....	170 44 23.80	+ 1.13	+ 1.49	- 57.27	
13	75 Draconis	E		20 31 56.0	2 22.0	51.05	50.20	.....	173 53 6.32	+ 1.32	+ 1.97	- 51.36	+81 6 4.72
		W		20 36 46.0	2 28.0	52.00	50.60	.....	258 13 3.40	+ 1.80	- 2.14	+ 51.36	
14	B. D. +83° 233 S. P.	W		20 42 41.0	2 31.6	52.05	50.55	.....	273 59 57.35	+ 1.94	+ 1.38	+ 30.46	+83 6 19.54
		E		20 47 31.0	2 18.4	51.00	49.90	.....	158 6 14.08	+ 1.01	- 1.15	- 30.46	
15	Groombridge 1480 S. P.	E		20 54 21.0	2 29.9	51.05	50.10	.....	156 12 28.05	+ 1.16	- 1.68	- 37.53	+81 12 27.62
		W		20 59 15.0	2 24.1	51.95	50.80	.....	275 53 41.28	+ 2.00	+ 1.56	+ 37.53	
16	3 Piscis Australis	W		21 3 45.0	3 40.5	52.20	50.65	.....	149 8 57.08	+ 1.87	+21.45	- 2 12.50	-28 0 39.48
		E		21 10 2.0	2 27.5	50.45	50.05	.....	282 56 56.38	+ 1.93	- 8.86	+ 2 12.48	
17	1 H. Draconis S. P.	E		21 20 53.0	2 28.6	51.35	50.10	.....	156 44 42.20	+ 1.30	- 1.56	- 35.61	+81 44 42.78
		W		21 25 43.0	2 21.4	51.55	50.80	.....	275 21 28.62	+ 1.83	+ 1.42	+ 35.62	
18	2 Cephei	W		21 39 40.0	3 1.1	51.00	49.90	.....	237 45 44.48	+ 1.10	-18.38	+ 22.75	+60 41 1.46
		E		21 45 36.0	2 54.9	49.65	49.85	.....	194 17 25.15	+ 0.78	+17.14	- 22.75	
19	0 Aquarii	E		21 55 52.0	2 28.2	50.50	50.40	.....	257 34 46.88	+ 1.20	-14.04	+ 50.43	- 2 37 0.52
		W		22 1 18.0	2 57.8	51.85	50.30	.....	174 31 18.72	+ 1.65	+20.21	- 50.43	

Time	Ther- m.	Att. ther	Barom	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1903 0
<i>d h m</i>	<i>°</i>		<i>mm</i>				
21 7	50.9				1	210 3	7.62
21 15		51.0	29.946		2		7.55
21 23	50.9				3		5.23
21 31	50.1				4		6.97
21 39	49.8	52.0	29.942		5		5.19
21 47	49.7				6		6.94
21 55	49.4				7		6.10
22 03	47.9	51.0	29.940		8		6.68
22 11	47.9				9		6.74
22 19	46.9	49.9	29.936		10		7.34
22 27		49.5	29.938		11		5.53
22 35	39.1				12		6.22
22 43	38.6	51.0	29.934		13		6.34
22 51	58.2				14		7.10
22 59		50.5	29.932		15		6.64
23 07	57.1				16		4.92
23 15	56.9				17		6.91
23 23	56.8				18		5.14
23 31		48.0	29.930		19		7.11
23 39	56.2						
23 47	56.0						
23 55	55.8						

Note
15 E. One level reading increased 10 div

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	λ Cephei	W	...	22 5 42.0	2 33.9	51.00	49.60	.....	236 4 30.90	+ 0.91	-15.14	+ 20.77	+58 56 47.94
		E	...	22 11 9.0	2 53.1	49.95	49.60	.....	196 1 35.68	+ 0.79	+19.15	- 20.77	
2	32 H. Cephei	E	...	22 18 5.0	3 8.0	51.20	49.80	.....	169 21 30.82	+ 1.24	+ 1.57	-1 0.50	+85 37 50.54
		W	...	22 24 4.0	2 51.0	51.00	49.50	.....	262 44 40.82	+ 0.90	- 1.30	+1 0.50	
3	40 G. Piscis Australis	W	...	22 30 25.0	3 0.3	50.65	49.70	.....	143 35 30.25	+ 1.05	+12.05	-2 58.40	-33 34 56.24
		E	...	22 36 26.0	3 0.7	50.85	50.15	.....	288 30 32.25	+ 1.13	-12.10	+2 58.42	
4	Groombridge 3212 S. P.	E	...	8 11 9.0	2 17.7	49.50	46.40	.....	159 23 38.35	+ 1.25	- 0.94	-1 27.64	+84 23 47.50
		W	...	8 16 0.0	2 33.3	48.95	45.05	.....	272 42 33.45	+ 0.47	+ 1.16	+1 27.65	
5	Groombridge 3260 S. P.	W	...	8 21 40.0	2 11.0	48.75	45.75	.....	272 51 25.05	+ 0.65	+ 0.87	+1 28.69	+84 14 55.34
		E	...	8 26 31.0	2 40.0	49.55	46.30	.....	159 14 48.18	+ 1.02	- 1.30	-1 28.69	
6	75 Draconis S. P.	E	...	8 32 3.0	2 14.8	49.15	45.80	.....	156 6 10.42	+ 0.52	- 1.38	-1 40.44	+81 6 5.13
		W	...	8 37 18.0	3 0.2	48.45	46.05	.....	276 0 2.28	+ 0.39	+ 2.46	+1 40.45	
7	B. D. +83° 233	W	...	8 42 57.0	2 15.6	48.30	46.00	.....	260 13 14.52	+ 0.60	- 1.34	+ 56.33	+83 6 20.78
		E	...	8 47 50.0	2 37.4	49.30	46.05	.....	171 52 55.50	+ 0.85	+ 1.81	- 56.33	
8	Groombridge 1480	E	...	8 54 20.0	2 30.9	48.80	46.10	.....	173 46 44.68	+ 0.69	+ 2.20	- 52.56	+81 12 26.68
		W	...	8 59 39.0	2 48.1	48.50	46.10	.....	258 19 24.52	+ 0.74	- 2.73	+ 52.56	
9	1 H. Draconis	W	...	9 20 53.0	2 28.6	49.15	46.00	.....	258 51 35.58	+ 0.94	- 1.98	+ 54.09	+81 44 40.00
	November 12, H.	E	...	9 25 43.0	2 21.4	49.05	45.90	.....	173 14 33.58	+ 0.63	+ 1.79	- 54.09	
10	β Cephei	E	...	21 24 30.0	2 55.8	50.35	49.65	.....	184 50 3.65	+ 2.26	+ 8.59	- 35.10	+70 8 44.09
		W	...	21 30 25.0	2 59.2	52.45	51.00	.....	247 16 4.58	+ 3.55	- 8.93	+ 35.10	
11	ν Cephei	W	...	21 40 9.0	2 31.7	50.10	50.05	.....	237 48 37.40	+ 2.46	-12.90	+ 23.16	+60 41 1.56
		E	...	21 45 9.0	2 28.3	47.90	49.25	.....	194 17 29.55	+ 1.55	+12.33	- 23.16	
12	28 Aquarii	E	...	21 53 39.0	2 30.2	[49.40]	49.70	.....	254 49 2.92	+ 2.77	-15.29	+ 46.79	+ 0 8 46.84
		W	...	21 58 38.0	2 28.8	[52.95]	50.90	.....	177 17 5.45	+ 3.93	+15.00	- 46.79	
13	24 Cephei	W	...	22 5 27.0	2 32.2	49.60	49.70	.....	248 59 42.72	+ 2.32	- 5.62	+ 37.75	+71 52 26.96
		E	...	22 10 27.0	2 27.8	47.20	49.00	.....	183 6 27.95	+ 1.04	+ 5.30	- 37.75	
14	30 H. Camelop. S. P.	E	...	22 16 53.0	2 23.8	48.70	49.10	.....	158 2 28.10	+ 1.55	- 1.25	-1 33.04	+83 2 31.17
		W	...	22 21 53.0	2 36.2	51.00	50.90	.....	274 3 41.88	+ 3.33	+ 1.48	+1 33.05	
15	κ Aquarii	W	...	22 30 20.0	2 26.1	49.40	49.20	.....	172 25 13.65	+ 1.94	+13.08	- 55.50	- 4 43 17.62
		E	...	22 35 14.0	2 27.9	47.05	48.95	.....	259 40 58.35	+ 1.24	-13.41	+ 55.51	
16	β Piscium	E	...	22 56 30.0	2 28.7	49.60	49.40	.....	251 39 36.68	+ 2.17	-16.00	+ 41.71	+ 3 18 19.11
		W	...	23 1 27.0	2 28.3	51.55	50.25	.....	180 26 32.10	+ 3.00	+16.00	- 41.69	
17	ψ^1 Aquarii	W	...	23 8 19.0	2 31.9	50.80	49.85	.....	167 32 4.30	+ 2.49	+12.88	-1 5.79	- 9 36 37.20
		E	...	23 13 21.0	2 30.1	48.25	49.30	.....	264 34 6.92	+ 1.45	-12.58	+1 5.77	
18	1 H. Cassiopeiae	E	...	23 23 4.0	2 32.9	49.50	49.50	.....	196 57 0.22	+ 2.08	+16.05	- 20.17	+58 1 25.44
		W	...	23 28 15.0	2 38.1	51.50	50.40	.....	235 9 9.62	+ 3.15	-17.10	+ 20.17	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>in.</i>								
10 22 8	55.8	...	...						1	216 3 6.14	-38.99
22 21	54.9	...	...						2	7.02	-38.98
22 33	55.3	...	...						3	6.82	-13.70
22 40	...	57.0	29.776						4	6.88	-36.64
8 8	...	48.5	29.724						5	7.24	-37.30
8 14	48.1	...	...						6	7.35	-38.03
8 24	45.0	...	...						7	5.97	+37.13
8 30	...	46.5	29.724						8	5.05	+37.32
8 35	43.9	...	...						9	5.27	...
8 45	46.0	...	...						10	6.85	...
8 57	47.6	...	...						11	5.20	-39.41
9 3	...	47.0	29.726						12	7.39	-25.95
9 21	43.0	...	...						13	6.86	...
9 30	...	45.5	29.734						14	7.55	+38.19
12 21 27	47.8	50.5	29.782						15	7.43	-23.32
21 43	47.0	...	...						16	6.94	-25.56
21 49	...	48.0	29.780						17	7.72	-21.22
21 56	44.7	...	...						18	6.98	-35.99
22 8	45.0	...	...						
22 19	44.9	...	...						
22 25	...	48.0	29.776								
22 31	44.9	...	...						
22 52	...	47.0	29.776								
22 59	45.0	...	...						
23 11	44.8	...	...						
23 26	44.5	...	...						

Notes.

- 1 E. One microscope reading decreased 10".
8. Poor seeing.
12. Upper level reading rejected.
14 E. One microscope reading increased 10".

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Cephei	W	...	23 32 29.0	2 59.8	51.25	49.70	.....	254 13 9.35	+ 2.74	- 4.95	+ 45.78	+77 6 2.15
		E	...	23 37 15.0	1 40.2	49.05	49.35	.....	177 53 4.08	+ 1.87	+ 1.73	- 45.78	
2	25 Piscium	E	...	23 45 38.0	2 31.2	50.20	49.85	.....	253 24 24.32	+ 2.37	-15.98	+ 44.51	+ 1 33 29.48
		W	...	23 50 35.0	2 25.8	51.65	50.35	.....	178 41 47.25	+ 3.29	+14.86	- 44.51	
3	2 Ceti	W	...	23 50 16.0	2 32.7	50.40	49.00	.....	159 10 50.38	+ 2.38	+11.25	-1 28.84	-17 52 15.04
		E	...	0 0 39.0	1 50.3	48.50	49.00	.....	272 40 14.00	+ 1.56	- 5.87	+1 28.84	
4	November 14, H. ν Cephei	E	...	21 40 9.0	2 31.3	52.45	50.50	.....	194 17 27.98	+ 2.61	+12.83	- 23.31	+60 41 1.05
		W	...	21 45 9.0	2 28.7	50.80	49.75	.....	237 48 36.42	+ 1.62	-12.39	+ 23.31	
5	13 Cephei	W	...	21 50 8.0	1 31.0	50.20	49.20	.....	233 17 20.42	+ 1.28	- 6.60	+ 18.12	+56 9 44.59
		E	...	21 54 15.0	2 36.0	50.30	50.00	.....	198 48 34.45	+ 1.58	+19.40	- 18.12	
6	28 Pegasi	E	...	22 3 25.0	2 31.7	52.20	50.60	.....	234 27 53.15	+ 2.65	-28.95	+ 19.40	+20 30 35.52
		W	...	22 8 23.0	2 26.3	50.85	49.70	.....	197 38 15.05	+ 1.57	+26.93	- 19.40	
7	ρ Aquarii	W	...	22 12 35.0	2 32.4	49.85	48.95	.....	168 50 31.80	+ 0.93	+13.29	-1 3.11	- 8 18 6.85
		E	...	22 17 35.0	2 27.6	50.50	50.45	.....	263 15 37.22	+ 2.01	-12.47	+1 3.11	
8	ν Aquarii	E	...	22 26 53.0	2 32.0	52.15	50.90	.....	276 8 47.60	+ 2.62	-10.54	+1 41.37	-21 11 59.16
		W	...	22 31 53.0	2 28.0	50.85	50.25	.....	155 57 18.85	+ 1.98	+10.00	-1 41.37	
9	94 H ¹ . Aquarii	W	...	22 47 37.0	2 34.0	48.70	49.00	.....	171 38 38.32	+ 0.62	+14.31	- 57.33	- 5 29 52.97
		E	...	22 52 35.0	2 24.0	51.15	50.50	.....	260 27 28.08	+ 2.21	-12.51	+ 57.35	
10	β Piscium	E	...	22 56 38.0	2 20.4	51.70	50.75	.....	251 39 34.75	+ 2.52	-14.34	+ 41.95	+ 3 18 17.99
		W	...	23 1 40.0	2 41.6	50.35	49.40	.....	180 26 29.25	+ 1.30	+19.00	- 41.96	
11	ϕ^1 Aquarii	W	...	23 8 19.0	2 31.6	49.45	49.20	.....	167 32 6.12	+ 0.87	+12.83	-1 6.27	- 9 36 36.79
		E	...	23 13 19.0	2 28.4	51.40	51.10	.....	264 34 4.02	+ 2.39	-12.30	+1 6.27	
12	39 H. Cephei	E	...	23 25 17.0	2 51.0	51.15	50.85	.....	168 12 27.80	+ 2.25	+ 0.94	-1 4.77	+86 46 57.19
		W	...	23 30 17.0	2 9.0	50.15	50.60	.....	263 53 41.12	+ 1.99	- 0.53	+1 4.77	
13	19 Piscium	W	...	23 38 56.0	2 32.3	50.05	49.60	.....	180 5 34.68	+ 1.46	+16.74	- 42.50	+ 2 57 19.27
		E	...	23 43 56.0	2 27.7	51.35	50.80	.....	252 0 35.85	+ 2.30	-15.74	+ 42.60	
14	30 Piscium	E	...	23 54 29.0	2 32.3	52.95	51.10	.....	261 30 23.22	+ 2.92	-13.72	+ 50.65	- 6 32 48.55
		W	...	23 59 31.0	2 29.7	51.30	49.95	.....	170 35 46.05	+ 2.04	+13.26	- 50.65	
15	κ^2 Sculptoris	W	...	0 4 42.0	1 59.0	50.95	49.55	.....	148 49 50.22	+ 1.75	+ 5.73	-2 19.14	-28 20 10.21
		E	...	0 9 12.0	2 31.0	51.60	50.70	.....	283 16 20.02	+ 2.29	- 9.23	+2 19.15	
16	December 7, L. 12 Ceti	W	...	0 23 6.0	1 49.4	55.25	50.60	.....	316 35 28.12	+ 3.85	+ 7.37	- 55.58	- 4 29 17.03
		E	...	0 28 10.0	3 14.6	49.85	48.05	.....	43 23 17.92	+ 0.82	-23.31	+ 55.59	
17	γ Cassiopeiae	W	...	0 48 58.0	1 45.4	55.25	51.05	.....	21 15 42.92	+ 4.08	- 6.46	+ 22.94	+60 12 3.12
		E	...	0 53 54.0	3 10.6	50.05	48.05	.....	338 42 31.40	+ 0.87	+21.11	- 22.95	
18	μ Cassiopeiae	E	...	0 59 12.0	2 29.2	50.25	48.35	.....	344 27 15.00	+ 1.09	+20.51	- 16.38	+54 27 10.92
		W	...	1 4 10.0	2 28.8	54.90	51.05	.....	15 31 9.80	+ 3.96	-20.40	+ 16.39	
19	f Piscium	W	...	1 10 8.0	2 30.1	55.15	50.90	.....	324 10 55.18	+ 3.96	+16.32	- 42.53	+ 3 6 32.98
		E	...	1 15 4.0	2 25.9	49.50	47.80	.....	35 47 32.45	+ 0.58	-15.41	- 42.55	

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>			<i>in</i>				
12 23 41	44.0	46.8	29.720		1	210 5 7.41	.....
23 17	43.5				2	8.06	-21.57
23 18	43.5				3	6.88	
5 4		46.9	29.726		4	4.54	-19.47
14 21 47		42.9	29.711		5	5.26	-38.98
21 43	46.6				6	5.20	-11.41
21 52	46.1				7	6.39	-21.96
22 6	46.0	48.5	29.946		8	5.26	-17.14
22 15	46.1				9	6.67	-22.68
22 29	46.1				10	6.24	-25.41
22 35	46.0	47.7	29.932		11	6.96	-26.99
22 50	46.0				12	6.78	
22 59	47.0				13	7.05	-24.06
23 6	47.0	47.9	29.948		14	6.88	
23 11	44.5				15	5.40	-14.18
23 28	44.1				16	169 50 17.49	
23 47	44.1	46.0	29.960		17	16.96	
5 7	41.9				18	15.44	
5 7	43.7				19	16.65	
5 11	43.1	46.0	29.966				
5 15	39.1	41.1	29.682				
5 18	38.2						

Notes.

1 E. Clock time increased 2m.

16 E. Clock time increased 1m.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris	E	...	1 21 34.0	3 33.2	49.75	48.30	...	310 7 49.82	+ 0.92	+ 0.53	-1 9.89	+88 47 52.70
		W	...	1 27 58.0	2 50.8	54.40	51.15	...	49 50 40.18	+ 3.84	- 0.34	+1 9.90	
2	ω Cassiopeiæ	W	...	1 33 16.0	1 47.4	54.60	50.55	...	28 37 5.82	+ 3.61	- 3.90	+ 32.23	+67 33 38.64
		E	...	1 38 6.0	3 2.6	49.40	47.85	...	331 21 14.08	+ 0.57	+ 11.27	- 32.24	
3	β Arietis	E	...	1 47 6.0	2 1.8	49.50	48.30	...	18 34 8.38	+ 0.81	- 18.53	+ 19.87	+20 20 22.74
		W	...	1 51 42.0	2 34.2	54.75	51.05	...	341 24 9.10	+ 3.89	+ 29.68	- 19.87	
4	β Trianguli	W	...	2 2 2.0	1 35.8	53.60	50.20	...	355 35 24.72	+ 3.12	+ 41.89	- 4.54	+34 32 5.18
		E	...	2 6 28.0	2 50.2	50.05	48.25	...	4 24 34.35	+ 0.98	-2 11.86	+ 4.57	
5	κ Fornacis	E	...	2 16 46.0	1 10.5	49.25	48.00	...	63 7 56.58	+ 0.58	- 2.15	+1 56.00	-24 15 17.78
		W	...	2 23 4.0	5 7.5	54.55	50.75	...	296 49 53.58	+ 3.71	+ 40.98	-1 50.01	
6	α Ursæ Minoris s.p.	W	...	13 18 8.0	6 58.7	53.45	49.50	...	52 14 45.08	+ 2.72	+ 1.96	+1 17.52	+88 47 54.36
	December 9, L.	E	...	13 24 54.0	0 12.7	50.60	47.85	...	307 43 45.72	+ 1.00	0.00	-1 17.52	
7	γ Cassiopeiæ	E	...	0 47 16.0	3 26.9	54.05	50.05	...	338 42 25.95	+ 1.20	+ 24.87	- 22.86	+60 12 3.50
		W	...	0 52 20.0	1 37.1	53.15	49.30	...	21 15 45.02	+ 0.57	- 5.48	+ 22.86	
8	μ Cassiopeiæ	W	...	0 59 10.0	2 30.7	52.95	49.00	...	15 31 11.30	+ 0.35	- 20.93	+ 16.32	+54 27 10.28
		E	...	1 3 20.0	1 39.3	52.85	49.05	...	344 27 26.55	+ 0.35	+ 9.09	- 16.32	
9	α Ursæ Minoris	W	...	1 20 56.0	4 9.1	52.65	49.00	...	49 50 43.60	+ 0.23	- 0.72	+1 9.53	+88 47 53.21
		E	...	1 26 4.0	0 58.9	53.40	49.70	...	310 7 48.08	+ 0.85	+ 0.04	-1 9.55	
10	ω Cassiopeiæ	E	...	1 32 2.0	3 0.9	54.30	50.00	...	331 21 13.12	+ 1.29	+ 11.06	- 32.05	+67 33 38.14
		W	...	1 36 42.0	1 39.1	54.30	49.95	...	28 37 6.52	+ 1.25	- 3.32	+ 32.05	
11	β Arietis	W	...	1 46 26.0	2 41.3	53.05	49.50	...	341 24 7.80	+ 0.59	+ 32.48	- 19.75	+20 20 21.36
	December 11, L.	E	...	1 51 18.0	2 10.7	53.35	49.25	...	18 34 12.62	+ 0.57	- 21.33	+ 19.75	
12	α Ursæ Minoris	W	...	1 21 12.0	3 48.7	52.35	48.90	...	49 50 40.60	+ 1.25	- 0.61	+1 12.05	+88 47 52.48
		E	...	1 26 16.0	1 15.3	51.15	48.55	...	310 7 52.75	+ 0.76	+ 0.07	-1 12.06	
13	ω Cassiopeiæ	E	...	1 32 13.0	2 47.2	51.70	48.90	...	331 21 17.85	+ 1.08	+ 9.45	- 33.22	+67 33 37.70
		W	...	1 37 50.0	2 49.8	53.30	48.90	...	28 37 12.28	+ 1.59	- 9.75	+ 33.23	
14	β Arietis	W	...	1 46 14.0	2 50.7	51.85	48.95	...	341 24 5.40	+ 1.09	+ 36.38	- 20.49	+20 20 22.32
		E	...	1 50 50.0	1 45.3	51.05	48.35	...	18 34 3.80	+ 0.52	- 13.85	+ 20.48	
15	κ Fornacis	E	...	2 15 12.0	2 41.3	50.55	48.00	...	63 8 1.78	+ 0.18	- 11.28	+2 0.02	-24 15 17.32
		W	...	2 21 39.0	3 45.7	54.00	49.40	...	296 50 18.82	+ 2.02	+ 22.08	-2 0.07	
16	γ Ursæ Minoris s.p.	W	...	2 26 18.0	1 2.6	52.50	49.00	...	64 54 33.62	+ 1.34	+ 0.44	+2 9.84	+76 7 16.66
		E	...	2 30 22.0	3 1.4	52.00	48.35	...	295 4 4.45	+ 0.82	- 3.70	-2 9.84	
17	η Eridani	E	...	2 48 48.0	2 40.8	52.65	49.10	...	48 10 34.48	+ 1.45	- 14.52	+1 8.22	- 9 16 55.80
		W	...	2 53 32.0	2 3.2	54.85	49.90	...	311 48 1.88	+ 2.64	+ 8.53	-1 8.23	
18	ζ Arietis	E	...	3 8 8.0	0 59.7	52.35	48.95	...	18 12 59.32	+ 1.30	- 4.53	+ 20.12	+20 41 16.22
		W	...	3 12 23.0	3 15.3	54.00	49.75	...	341 44 45.00	+ 2.22	+ 48.36	- 20.14	
19	ξ Tauri	W	...	3 18 30.0	3 12.6	53.10	49.20	...	330 27 50.95	+ 1.71	+ 31.51	- 34.59	+ 9 23 49.70
		E	...	3 23 35.0	1 52.4	51.80	48.55	...	29 30 18.65	+ 0.87	- 10.74	+ 34.60	
20	11 H ¹ . Camelop.	E	...	3 30 29.0	3 6.8	52.90	49.05	...	336 0 22.02	+ 1.48	+ 16.59	- 27.21	+62 54 21.27
		W	...	3 37 14.0	3 38.2	53.20	49.20	...	23 58 15.98	+ 1.66	- 22.63	+ 27.21	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	
7 1 25	37.9	40.3	29.714							1	359 50 17.48	
1 49	37.4									2	15.72	
2 20	38.6	39.3	29.724							3	16.66	
13 22	34.1	31.6	29.808							4	16.62	
9 0 50	32.0	33.8	29.172							5	16.64	
1 12	31.8									6	18.24	
1 24	31.7									7	16.06	
1 49	31.7	33.4	29.168							8	13.30	
11 1 21	27.8	29.9	29.968							9	16.04	
2 11		28.9	29.968							10	14.96	
2 18	26.3									11	16.36	
2 51	25.8									12	17.40	
3 10	26.0									13	16.26	
3 34	25.4									14	16.66	
										15	16.78	
										16	18.48	
										17	17.22	
										18	15.82	
										19	16.48	
										20	17.50	12.35

Notes.
 1 W. One microscope reading changed from 17".2 to 22".8.
 3 W. One level reading decreased 10 div.
 7. Clouds.
 9. Unsteady.
 20 E. One microscope reading changed from 44".1 to 35".9.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	9 H. Camelop.	W	...	3 45 34.0	3 0 3	52.00	49.20	...	21 53 34.25	+ 1.64	- 19.87	+ 24.59	+60 49 39.76
		E	...	3 50 26.0	1 42.7	52.00	48.90	...	338 5 11.85	+ 1.17	+ 5.85	- 24.59	
2	A Tauri	E	...	3 56 32.0	2 14.0	53.30	49.60	...	17 5 30.55	+ 1.96	- 24.05	+ 18.82	+21 49 6.40
	December 14, L.	W	...	4 1 27.0	2 41.0	54.20	49.75	...	342 52 48.70	+ 2.20	+ 34.72	- 18.82	
3	12 Ceti	W	...	0 22 12.0	2 33.2	54.90	50.50	...	316 35 25.40	+ 2.90	+ 14.44	- 57.52	- 4 29 16.87
		E	...	0 27 54.0	3 8.8	50.40	48.25	...	43 23 16.25	+ 0.21	- 21.94	+ 57.54	
4	21 Cassiopeia	E	...	0 38 0.0	0 58.2	51.95	48.70	...	324 27 9.55	+ 1.02	+ 0.66	- 43.51	+74 28 4.64
		W	...	0 43 12.0	4 13.8	55.65	50.80	...	35 31 29.58	+ 3.28	- 12.50	+ 43.53	
5	γ Cassiopeia	W	...	0 48 42.0	1 51.1	55.35	50.70	...	21 15 45.25	+ 3.14	- 7.17	+ 23.75	+60 12 4.40
		E	...	0 53 44.0	3 10.9	50.80	48.50	...	338 42 31.42	+ 0.53	+ 21.17	- 23.76	
6	μ Cassiopeia	E	...	0 59 40.0	1 51.0	52.00	48.85	...	344 27 26.48	+ 1.13	+ 11.36	- 16.96	+54 27 11.38
		W	...	1 4 53.0	3 22.0	55.50	50.85	...	15 31 28.90	+ 3.26	- 37.58	+ 16.98	
7	f Piscium	W	...	1 10 16.0	2 12.0	55.25	50.85	...	324 11 0.05	+ 3.17	+ 12.62	- 44.04	+ 3 6 31.90
		E	...	1 14 42.0	2 14.0	51.20	48.25	...	35 47 29.58	+ 0.56	- 13.00	+ 44.06	
8	α Ursæ Minoris	E	...	1 21 58.0	2 53.5	52.20	49.10	...	310 7 51.70	+ 1.33	+ 0.35	- 12.36	+88 47 53.15
		W	...	1 26 54.0	2 2.5	55.45	50.95	...	49 50 38.65	+ 3.26	- 0.17	+ 12.38	
9	ω Cassiopeia	W	...	1 32 36.0	2 17.1	55.00	50.55	...	28 37 9.75	+ 2.94	- 6.35	+ 33.37	+67 33 39.50
		E	...	1 37 50.0	2 56.9	51.30	48.65	...	331 21 15.90	+ 0.80	+ 10.58	- 33.37	
10	β Arietis	E	...	1 45 48.0	3 9.7	52.70	49.00	...	18 34 34.48	+ 1.39	- 44.93	+ 20.58	+20 20 22.27
		W	...	1 51 30.0	2 32.3	55.95	51.00	...	341 24 11.05	+ 3.44	+ 28.95	- 20.58	
11	κ Fornacis	W	...	2 17 2.0	0 44.3	54.50	50.45	...	296 50 38.48	+ 2.71	+ 0.85	- 2 0.45	-24 15 19.10
		E	...	2 21 45.0	3 58.7	51.85	48.55	...	63 8 16.32	+ 0.89	- 24.70	+ 2 0.48	
12	γ Persei	E	...	2 54 37.0	2 52.3	53.95	49.30	...	345 46 22.10	+ 1.65	+ 30.78	- 15.52	+53 7 54.06
		W	...	2 59 50.0	2 20.7	55.50	50.60	...	14 11 55.85	+ 3.09	- 20.53	+ 15.51	
13	ζ Arietis	W	...	3 7 8.0	1 52.8	54.90	50.20	...	341 45 20.50	+ 2.74	+ 16.14	- 20.18	+20 41 18.49
		E	...	3 11 36.0	2 35.2	51.85	48.65	...	18 13 24.82	+ 0.98	- 30.55	+ 20.17	
14	ε Tauri	E	...	3 20 47.0	0 48.7	52.65	49.45	...	29 30 10.48	+ 1.60	- 2.01	+ 34.66	+ 9 23 49.22
		W	...	3 25 17.0	3 41.3	50.45	51.10	...	330 27 39.32	+ 3.71	+ 41.60	- 34.67	
15	η Tauri	W	...	3 37 41.0	3 43.6	54.35	50.10	...	344 51 26.75	+ 2.51	+ 14.37	- 16.56	+23 48 26.61
		E	...	3 42 20.0	0 55.4	51.95	48.80	...	15 5 54.05	+ 1.03	- 4.57	+ 16.54	
16	A Tauri	E	...	3 55 36.0	3 3.1	53.15	49.50	...	17 5 50.28	+ 1.74	- 44.90	+ 18.88	+21 49 6.12
		W	...	4 3 17.0	4 37.9	55.55	50.65	...	342 51 37.42	+ 3.19	+ 43.35	- 18.91	
17	α Ursæ Minoris s.p.	W	...	13 21 28.0	3 23.0	55.00	50.10	...	52 14 43.82	+ 2.60	+ 0.46	+ 19.29	+88 47 56.68
	December 15, L.	E	...	13 27 32.0	2 41.0	53.15	49.00	...	307 43 50.82	+ 1.57	- 0.29	- 19.29	
18	γ Cassiopeia	E	...	0 48 8.0	2 24.9	53.15	49.20	...	338 42 42.58	+ 1.14	+ 12.20	- 23.75	+60 12 2.04
		W	...	0 53 9.0	2 36.1	56.95	51.00	...	21 15 50.18	+ 3.26	- 14.16	+ 23.76	
19	μ Cassiopeia	W	...	0 58 9.0	3 21.7	56.85	50.90	...	15 31 28.42	+ 3.22	- 37.46	+ 16.97	+54 27 11.10
		E	...	1 3 42.0	2 11.3	52.15	48.65	...	344 27 22.68	+ 0.56	+ 15.89	- 16.97	
20	f Piscium	E	...	1 9 46.0	2 41.8	52.40	48.75	...	35 47 35.40	+ 0.70	- 18.06	+ 44.04	+ 3 6 32.00
		W	...	1 15 16.0	2 48.2	57.00	51.10	...	324 10 52.20	+ 3.35	+ 20.49	- 44.06	

Time	Ther. (882)	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below				No	Zenith point.	Red. to 1903.0
11 30	28.8	28.0	29.980	1 W.	15 W.	Clock time decreased 10"		1	159 50 17.44	
11 40	29.7	34.2	30.118					2	17.08	
11 50	29.0							3	18.09	
1 12	28.2							4	18.56	
1 24	28.6	30.1	30.116					5	19.16	
1 40	27.4							6	19.78	
2 12	27.1	29.1	30.116					7	19.50	
2 31	26.8							8	17.57	
3 9	26.9	28.8	30.166					9	17.81	
3 41	26.7							10	17.19	
3 59	26.9	28.8	30.088	16 W.		One microscope reading changed from 54" to 47"		11	17.29	
4 24	24.1	26.9	30.049	14 W.		One microscope reading decreased 10"		12	16.46	
4 51	26.1	28.2	29.976	14		Hazy.		13	15.31	
5 1	26.1			16		Very thick		14	15.34	
5 15	26.1			17		Very faint observation doubtful		15	15.66	
								16	15.82	
								17	19.54	
								18	17.60	
								19	16.06	
								20	16.08	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris	W	...	1 20 52.0	3 58.5	55.40	50.40	...	49 50 40.40	+ 2.47	- 0.66	+ 12.34	+88 47 54.37
		E	...	1 26 42.0	1 51.5	52.50	48.90	...	310 7 50.45	+ 0.80	+ 0.14	- 12.38	
2	ω Cassiopeiæ	E	...	1 32 15.0	2 37.9	53.05	49.10	...	331 21 18.12	+ 1.07	+ 8.43	- 33.37	+67 33 38.74
		W	...	1 37 33.0	2 40.1	56.80	50.90	...	28 37 10.62	+ 3.19	- 8.66	+ 33.37	
3	β Arietis	W	...	1 46 20.0	2 37.5	55.10	50.20	...	341 24 9.75	+ 2.27	+ 30.97	- 20.57	+20 20 22.04
		E	...	1 51 52.0	2 54.5	52.05	48.65	...	18 34 28.45	+ 0.52	- 38.01	+ 20.58	
4	β Trianguli	E	...	2 4 ....	...	53.00	49.20	25.365	4 22 5.62	+ 1.82	+ 0.23	+ 4.70	+34 32 4.84
		W	...	...	...	55.85	50.90	27.050	355 34 41.38	+ 3.60	- 0.23	- 4.69	
5	κ Fornacis	W	...	2 15 12.0	2 34.1	54.95	50.00	...	296 50 27.32	+ 2.12	+ 10.29	- 2 0.40	-24 15 19.96
		E	...	2 20 32.0	2 45.9	51.85	48.50	...	63 8 3.60	+ 0.36	- 11.93	+ 2 0.41	
6	δ Ceti	E	...	2 31 26.0	2 45.0	53.00	48.90	...	38 59 12.78	+ 0.96	- 18.36	+ 40.56	- 0 5 12.90
		W	...	2 37 18.0	3 7.0	50.30	50.50	...	320 59 9.08	+ 2.83	+ 23.58	- 49.50	
7	τ Persei	W	...	2 44 18.0	2 47.4	55.25	50.25	...	13 26 29.48	+ 2.35	- 31.20	+ 14.65	+52 22 15.59
		E	...	2 49 24.0	2 18.6	51.70	48.35	...	346 32 10.32	+ 0.24	+ 21.39	- 14.65	
8	γ Persei	E	...	2 55 16.0	2 13.0	52.55	48.80	...	345 46 33.62	+ 0.75	+ 18.34	- 15.51	+53 7 55.39
		W	...	3 2 12.0	4 43.0	54.90	50.20	...	14 12 59.95	+ 2.22	- 22.93	+ 15.54	
9	December 16, L. μ Cassiopeiæ	W	...	0 58 34.0	2 56.4	...	...	...	15 31 23.55	+ 0.05	- 28.66	+ 16.86	+54 27 11.43
		E	...	1 3 1.0	1 30.6	52.60	49.40	...	344 27 30.18	+ 1.25	+ 7.56	- 16.85	
10	f Piscium	E	...	1 9 58.0	2 29.5	53.00	49.55	...	35 47 32.72	+ 1.46	- 16.18	+ 43.73	+ 3 6 31.92
		W	...	1 14 25.0	1 57.5	52.90	48.95	...	324 11 4.98	+ 1.12	+ 10.00	- 43.73	
11	α Ursæ Minoris	W	...	1 20 56.0	3 53.5	51.10	48.00	...	49 50 43.75	+ 0.04	- 0.63	+ 11.86	+88 47 54.42
		E	...	1 26 48.0	1 58.5	53.75	49.90	...	310 7 49.22	+ 1.87	+ 0.16	- 11.88	
12	ω Cassiopeiæ	E	...	1 33 1.0	1 51.5	54.00	49.75	...	331 21 20.80	+ 1.87	+ 4.20	- 33.14	+67 33 39.46
		W	...	1 37 43.0	2 50.5	52.85	48.65	...	28 37 15.18	+ 0.95	- 9.83	+ 33.14	
13	β Arietis	W	...	1 46 26.0	2 31.2	52.00	48.30	...	341 24 14.12	+ 0.47	+ 28.54	- 20.42	+20 20 21.91
		E	...	1 52 16.0	3 18.8	54.05	49.80	...	18 34 39.10	+ 1.89	- 49.33	+ 20.43	
14	ξ^2 Ceti	W	...	2 21 4.0	1 36.3	51.60	48.35	...	329 6 14.18	+ 0.37	+ 7.59	- 36.32	+ 8 1 44.60
		E	...	2 27 6.0	4 25.7	54.00	49.60	...	30 53 9.45	+ 1.79	- 57.76	+ 36.35	
15	δ Ceti	E	...	2 31 31.0	2 39.7	54.00	49.50	...	38 59 14.15	+ 1.74	- 17.19	+ 49.20	- 0 5 13.15
		W	...	2 36 43.0	2 32.3	53.10	48.55	...	320 59 20.98	+ 0.98	+ 15.64	- 49.20	
16	τ Persei	W	...	2 44 36.0	2 29.1	51.00	48.25	...	13 26 24.70	+ 0.43	- 24.76	+ 14.55	+52 22 15.22
		E	...	2 50 9.0	3 3.9	53.85	49.50	...	346 31 52.90	+ 1.70	+ 37.64	- 14.50	
17	γ Persei	E	...	2 55 16.0	2 12.7	54.90	50.10	...	345 46 34.05	+ 2.32	+ 18.26	- 15.41	+53 7 55.28
		W	...	3 0 59.0	3 30.3	52.30	48.45	...	14 12 26.35	+ 0.66	- 45.84	+ 15.42	
18	December 30, L. α Ursæ Minoris	E	...	1 13 4.0	11 29.0	50.15	48.15	...	310 8 1.52	+ 0.90	+ 5.51	- 12.98	+88 47 57.29
		W	...	1 18 30.0	6 3.0	51.15	48.30	...	49 51 3.62	+ 1.27	- 1.53	+ 12.98	
19	α Ursæ Minoris	W	...	1 23 34.0	0 59.0	50.60	48.00	...	49 51 1.78	+ 0.95	- 0.04	+ 13.00	+88 47 57.28
		E	...	1 30 2.0	5 29.0	50.20	48.05	...	310 8 5.18	+ 0.87	+ 1.26	- 13.00	
20	December 31, L. α Ursæ Minoris	E	...	1 11 10.0	13 21.9	52.55	49.50	...	310 7 56.40	+ 2.36	+ 7.47	- 11.01	+88 47 56.51
		W	...	1 19 18.0	5 13.9	49.00	47.85	...	49 51 4.82	+ 0.37	- 1.14	+ 11.02	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1903 0.
<i>d h m</i>			<i>m.</i>								<i>° ' "</i>	<i>"</i>
15 1 24	26.0			4. Instrument in meridian, observation at I with movable thread. Coincidence with fixed thread assumed.						1	359 59 16.78	
1 49	25.6	27.5	29.992							2	16.48	
2 18	25.1									3	16.98	
2 34	24.1	27.0	29.990							4	22.82	
2 59	25.0	26.7	29.990	Notes. 4. Observation hurried. 9 W. Level correction assumed. 15. High wind. 17 W. Clock time increased 10 ^s . 18. Faint; clouds.						5	15.88	
1 1	26.5	28.0	29.778							6	15.44	
1 12	26.4									7	16.29	
1 24	26.0									8	15.98	
1 49	25.8	27.1	29.788							9	16.97	
2 18	25.7	27.1	29.792							10	17.05	
2 24	25.7									11	17.20	
2 58	25.3	26.8	29.810							12	16.58	
1 6	21.3	24.2	29.926							13	17.40	
1 27	21.1	23.3	29.921							14	17.82	
31 1 15	31.8	33.3	29.788							15	18.15	
										16	16.30	
										17	17.90	
										18	35.64	
										19	35.00	
										20	35.14	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris	W	...	1 24 49.0	0 17.1	49.00	47.65	...	49 51 5.15	+ 0.27	0.00	+1 11.02	+88 47 57.19
		E	...	1 30 30.0	5 58.1	51.95	49.30	...	310 8 2.72	+ 2.07	1.49	-1 11.04	
1	β Arietis	E	...	1 46 20.0	2 33.0	52.60	49.20	...	18 34 36.18	+ 2.19	20.23	+ 20.19	+20 20 22.29
		W	...	1 52 14.0	3 21.0	51.35	48.80	...	341 24 8.88	+ 1.03	50.42	- 20.20	
3	γ Arietis	W	...	2 2 18.0	2 33.2	40.45	47.95	...	340 7 5.00	+ 0.57	27.69	- 21.71	+19 2 52.42
		E	...	2 8 14.0	3 22.8	52.15	49.20	...	10 52 24.65	+ 2.04	48.52	+ 21.72	
4	κ Fornacis	E	...	2 15 18.0	2 23.6	51.00	49.10	...	63 8 21.28	+ 1.91	8.94	+1 58.20	-24 15 21.05
		W	...	2 21 17.0	3 35.4	50.90	48.55	...	296 50 34.02	+ 1.33	20.11	-1 58.28	
5	δ Ceti	W	...	2 31 23.0	2 43.6	50.55	48.30	...	320 59 34.60	+ 1.10	18.05	- 48.69	- 0 5 13.63
		E	...	2 37 20.0	3 19.4	51.80	48.95	...	38 59 41.78	+ 1.83	26.81	+ 48.69	
6	τ Persei	E	...	2 44 25.0	2 35.0	52.15	49.40	...	346 32 19.55	+ 2.14	27.06	- 14.39	+52 22 17.69
		W	...	2 50 20.0	3 10.1	51.10	48.75	...	13 27 4.80	+ 1.50	44.13	+ 14.40	
7	ϵ Persei	W	...	2 59 6.0	2 35.9	51.20	48.50	...	10 10 36.42	+ 1.41	37.55	+ 10.97	+49 14 54.03
		E	...	3 5 10.0	3 28.2	51.50	49.30	...	349 38 58.55	+ 1.90	6.90	- 10.98	
8	ξ Tauri	E	...	3 18 59.0	2 32.1	52.05	49.50	...	29 30 46.18	+ 2.17	19.66	+ 34.07	+ 9 23 47.97
		W	...	3 25 2.0	3 30.9	51.85	49.45	...	330 27 59.70	+ 2.12	37.78	- 34.09	
9	η Tauri	W	...	3 31 57.0	2 38.6	51.25	49.30	...	346 4 59.25	+ 1.82	40.23	- 14.91	+25 1 7.07
		E	...	3 38 9.0	3 33.4	52.55	49.45	...	13 54 41.02	+ 2.31	12.81	+ 14.92	
10	θ H. Camelop.	E	...	3 45 48.0	2 43.7	52.30	49.55	...	338 5 16.65	+ 2.29	14.86	- 24.21	+60 49 43.88
		W	...	3 51 44.0	3 12.3	52.05	49.35	...	21 53 58.32	+ 2.13	20.50	+ 24.22	
11	α Tauri	W	...	3 56 23.0	2 11.5	51.80	49.30	...	342 53 20.50	+ 2.00	23.17	- 18.54	+21 49 7.77
		E	...	4 1 42.0	3 7.5	52.55	49.25	...	17 6 11.12	+ 2.19	47.08	+ 18.54	
12	σ^2 Eridani	E	...	4 7 45.0	2 39.4	52.10	49.20	...	46 42 18.62	+ 2.02	14.67	+1 3.87	- 7 48 18.14
		W	...	4 13 53.0	3 28.6	52.55	49.60	...	313 16 36.78	+ 2.38	25.12	-1 3.90	
13	ϵ Tauri	W	...	4 19 40.0	2 54.0	51.95	49.15	...	340 2 2.02	+ 2.00	35.60	- 21.87	+18 57 58.52
		E	...	4 25 44.0	3 10.0	52.50	49.30	...	19 57 12.22	+ 2.23	42.43	+ 21.87	
14	ζ Eridani	E	...	4 31 10.0	2 10.3	52.50	49.20	...	53 23 18.55	+ 2.18	8.69	+1 20.93	-14 29 40.96
		W	...	4 36 43.0	3 22.7	52.70	49.50	...	306 35 35.38	+ 2.40	21.02	-1 20.93	
15	π^5 Orionis	W	...	4 45 46.0	3 2.4	51.60	49.00	...	323 21 30.70	+ 1.79	23.64	- 44.73	+ 2 16 52.24
		E	...	4 52 7.0	3 18.6	52.20	49.25	...	36 37 41.30	+ 2.11	28.03	+ 44.72	

Time.	Ther- m.	Atm- ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point	Red. to 1903.0.
<i>h m</i>			<i>m</i>									
1 1 40	31.1	...	...							1	359 59 35.84	...
2 5	31.0	...	...							2	35.03	...
2 18	30.8	32.0	29.770							3	35.72	-17.13
2 44	30.0	...	...							4	34.82	...
2 47	29.7	...	...							5	35.28	...
3 2	29.7	...	...							6	35.40	...
3 42	29.3	...	...							7	34.81	-18.70
3 49	29.0	...	...							8	34.14	...
4 11	28.6	...	...							9	35.92	...
4 14	28.7	...	...							10	36.88	...
4 49	29.0	10.4	29.700							11	35.95	...
										12	35.11	...
										13	35.82	...
										14	35.42	...
										15	35.75	...

Note
13. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	January 7, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Arietis	W	...	1 45 51.0	3 27.5	38.90	48.00	...	341 24 4.40	+ 0.16	+53.74	- 20.10	+20 20 21.83
		E	...	1 52 17.0	2 58.5	42.65	49.85	...	18 34 45.12	+ 2.28	-39.77	+ 20.10	
2	γ Arietis	E	...	2 2 3.0	3 13.7	44.15	50.25	...	19 52 21.30	+ 2.97	-44.26	+ 21.63	+19 2 51.47
		W	...	2 8 38.0	3 21.3	42.70	48.95	...	340 6 43.38	+ 1.85	+47.80	- 21.63	
3	ξ^2 Ceti	W	...	2 20 18.0	2 43.7	40.40	48.05	...	329 6 14.88	+ 0.64	+21.93	- 35.77	+ 8 1 43.83
		E	...	2 25 52.0	2 50.3	42.65	49.70	...	30 52 52.95	+ 2.21	-23.73	+ 35.76	
4	τ Persei	E	...	2 44 0.0	3 26.4	44.65	50.30	...	346 31 53.28	+ 3.17	+47.39	- 14.32	+52 22 18.91
		W	...	2 50 30.0	3 3.6	42.45	48.75	...	13 26 55.70	+ 1.68	-37.53	+ 14.32	
5	ϵ Persei	W	...	2 59 2.0	3 5.6	42.25	48.90	...	10 19 54.45	+ 1.60	-53.19	+ 10.91	+49 14 54.22
		E	...	3 5 3.0	2 55.4	42.40	49.55	...	349 39 19.95	+ 2.06	+47.50	- 10.91	
6	ξ Tauri	W	...	3 18 57.0	2 59.7	41.80	48.75	...	330 28 10.00	+ 1.49	+27.43	- 33.86	+ 9 23 48.03
		E	...	3 24 49.0	2 52.3	42.60	49.50	...	29 30 51.45	+ 2.10	-25.22	+ 33.86	
7	η Tauri	E	...	3 32 11.0	2 50.2	43.40	49.80	...	13 54 16.00	+ 2.49	-46.33	+ 14.83	+25 1 7.27
		W	...	3 37 58.0	2 56.8	42.55	49.00	...	346 4 51.35	+ 1.83	+50.00	- 14.83	
8	θ H. Camelop.	W	...	3 45 59.0	2 57.3	41.30	48.65	...	21 53 56.52	+ 1.27	-17.43	+ 24.08	+60 49 45.59
		E	...	3 52 1.0	3 3.7	42.50	49.60	...	338 5 9.70	+ 2.12	+18.70	- 24.09	
9	ϕ^2 Eridani	E	...	4 8 23.0	2 27.1	43.70	49.60	...	46 42 17.40	+ 2.49	-12.50	+1 3.56	- 7 48 18.88
		W	...	4 13 52.0	3 1.9	43.90	49.25	...	313 16 42.12	+ 2.38	+19.10	-1 3.59	
10	ϵ Tauri	W	...	4 19 53.0	3 6.7	42.85	48.90	...	340 1 54.28	+ 1.80	+40.97	- 21.78	+18 57 58.89
		E	...	4 25 23.0	2 23.3	43.00	49.25	...	19 56 51.00	+ 2.11	-24.14	+ 21.78	
11	γ Eridani	E	...	4 30 52.0	2 53.9	42.95	49.20	...	53 23 26.72	+ 2.07	-15.47	+1 20.67	-14 29 41.61
		W	...	4 37 21.0	3 35.1	43.75	49.25	...	306 35 32.25	+ 2.36	+23.67	-1 20.70	
12	π^5 Orionis	W	...	4 46 6.0	3 8.1	42.75	48.85	...	323 21 27.40	+ 1.83	+25.14	- 44.65	+ 2 16 51.76
		E	...	4 52 9.0	2 54.9	42.15	49.00	...	36 37 34.75	+ 1.71	-21.74	+ 44.66	
13	β Eridani	E	...	4 59 48.0	3 18.9	43.10	49.30	...	44 7 4.62	+ 2.16	-24.01	+ 58.21	- 5 12 49.33
		W	...	5 6 10.0	3 3.1	43.95	49.20	...	315 52 4.60	+ 2.41	+20.35	- 58.22	
14	January 14, L. α Ursæ Minoris	E	...	1 15 26.0	9 20.6	44.40	49.95	...	310 7 58.82	+ 2.72	+ 3.65	-1 10.92	+88 47 57.62
		W	...	1 21 26.0	3 20.6	44.35	49.90	...	49 51 3.22	+ 2.64	- 0.47	+1 10.94	
15	α Ursæ Minoris	E	...	1 27 20.0	1 33.4	43.55	49.45	...	310 8 1.80	+ 2.10	+ 0.10	-1 10.96	+88 47 58.88
		W	...	1 32 58.0	7 11.4	44.50	49.85	...	49 51 6.20	+ 2.68	- 2.16	+1 10.99	
16	β Arietis	E	...	1 46 17.0	3 4.5	42.05	49.00	...	18 34 51.12	+ 1.44	-42.49	+ 20.17	+20 20 21.37
		W	...	1 52 21.0	2 59.5	44.60	49.75	...	341 24 17.12	+ 2.63	+40.23	- 20.18	
17	γ Arietis	W	...	2 2 31.0	2 48.5	43.30	49.40	...	340 6 55.35	+ 2.05	+33.49	- 21.71	+19 2 50.70
		E	...	2 8 19.0	2 59.5	42.75	48.55	...	19 52 15.82	+ 1.43	-38.01	+ 21.72	
18	ξ^2 Ceti	E	...	2 20 10.0	2 54.7	42.10	48.55	...	30 52 56.18	+ 1.24	-24.97	+ 35.94	+ 8 1 43.03
		W	...	2 25 54.0	2 49.3	45.75	50.40	...	329 6 10.38	+ 3.39	+23.45	- 35.95	
19	δ Ceti	W	...	2 31 36.0	2 59.1	45.10	50.15	...	320 59 27.18	+ 3.03	+21.63	- 48.65	- 0 5 15.73
		E	...	2 37 26.0	2 50.9	41.45	48.20	...	38 59 38.00	+ 0.87	-19.69	+ 48.66	
20	τ Persei	W	...	2 44 17.0	3 12.3	45.35	50.05	...	13 27 0.45	+ 3.04	-41.16	+ 14.39	+52 22 18.82
		E	...	2 50 26.0	2 56.7	41.30	48.05	...	346 32 11.20	+ 0.71	+34.75	- 14.40	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
7 1 49	31.2	33.1	29.648					1	359 59 32.96	.....
2 6	30.7	...	...					2	36.52	+0.10
2 47	30.4	32.1	29.622					3	34.44	.....
3 2	30.4	...	...					4	31.84	.....
3 22	30.4	...	...					5	36.23	-5.46
3 49	29.9	31.4	29.626					6	33.62	.....
4 11	29.3	...	...					7	37.67	.....
4 23	29.1	...	...					8	35.44	.....
4 34	28.7	...	...					9	35.48	.....
4 49	28.3	...	...					10	33.06	.....
5 3	28.3	30.4	29.618					11	35.78	.....
14 1 18	28.9	31.4	29.574					12	34.55	.....
1 49	28.3	...	...					13	35.06	.....
2 5	28.0	30.0	29.580					14	35.30	.....
2 23	27.4	...	...					15	35.42	.....
2 35	27.5	...	...					16	35.02	.....
2 47	27.1	28.7	29.586					17	35.07	+1.51
								18	34.83	.....
								19	35.52	.....
								20	34.49	.....

Notes.
2, 3, 5. Clouds.
11. Faint.

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Persei	E	...	2 58 55.0	3 15.6	43.45	48.95	...	349 39 8.00	+ 1.89	+ 59.05	- 10.98	+49 14 53.49
		W	...	3 5 3.0	2 52.4	45.45	50.25	...	10 19 43.50	+ 3.20	- 45.91	+ 10.98	
2	α Persei	W	...	3 14 21.0	3 9.5	45.25	50.00	...	10 36 12.68	+ 2.06	- 53.74	+ 11.29	+49 31 15.92
		E	...	3 20 24.0	2 53.5	40.75	47.90	...	349 23 0.39	+ 0.47	+ 45.05	- 11.29	
3	η Tauri	E	...	3 32 0.0	3 4.2	41.05	48.00	...	13 54 23.28	+ 0.60	- 54.26	+ 14.94	+25 1 6.64
		W	...	3 38 2.0	3 4.8	46.00	50.60	...	346 4 45.52	+ 3.52	+ 50.56	- 14.94	
4	θ H. Camelop.	W	...	3 46 1.0	2 59.2	45.05	50.20	...	21 53 54.82	+ 3.06	- 17.80	+ 24.26	+60 49 45.84
		E	...	3 51 29.0	2 28.8	40.80	47.95	...	338 5 17.30	+ 0.53	+ 12.27	- 24.26	
5	λ Tauri	E	...	3 55 51.0	3 12.2	40.90	48.05	...	17 6 14.88	+ 0.58	- 49.47	+ 18.57	+21 49 7.45
		W	...	4 1 45.0	2 41.8	46.20	50.55	...	342 53 6.20	+ 3.58	+ 35.07	- 18.57	
6	σ^2 Eridani	W	...	4 8 16.0	2 37.1	45.30	50.30	...	313 16 45.40	+ 3.15	+ 14.25	- 1 3.97	- 7 48 20.29
		E	...	4 14 0.0	3 6.9	40.00	47.50	...	46 42 28.72	+ 0.02	- 20.16	+ 1 4.00	
7	ζ Eridani	W	...	4 31 10.0	2 39.0	45.80	50.40	...	306 35 42.48	+ 3.39	+ 12.93	- 1 21.17	- 14 29 42.35
		E	...	4 37 6.0	3 17.0	40.00	47.50	...	53 23 34.15	+ 0.05	- 19.86	+ 1 21.17	
8	π^3 Orionis	E	...	4 46 16.0	3 1.2	40.65	47.60	...	36 37 38.92	+ 0.31	- 23.33	+ 44.91	+ 2 16 50.61
		W	...	4 52 51.0	3 33.8	46.60	50.70	...	323 21 17.52	+ 3.79	+ 32.47	- 44.94	
9	January 21, L. α Cassiopeiae	W	...	0 32 40.0	2 23.9	39.70	47.25	...	17 5 10.20	+ 0.23	- 16.71	+ 17.76	+56 0 53.25
		E	...	0 38 29.0	3 25.1	39.45	47.30	...	342 53 41.82	+ 0.18	+ 33.92	- 17.77	
10	γ Cassiopeiae	E	...	0 48 17.0	2 38.4	41.35	48.60	...	338 42 55.32	+ 1.43	+ 14.57	- 22.53	+60 12 3.59
		W	...	0 54 30.0	3 34.6	41.10	47.95	...	21 16 25.98	+ 1.01	- 26.75	+ 22.54	
11	η Ceti	W	...	1 1 7.0	2 38.7	41.10	47.90	...	310 23 37.02	+ 1.01	+ 13.79	- 1 7.95	- 10 41 35.69
		E	...	1 8 2.0	4 16.3	41.55	48.55	...	49 35 54.88	+ 1.50	- 35.96	+ 1 8.01	
12	θ Ceti	E	...	1 16 16.0	2 57.6	42.00	48.05	...	47 34 56.08	+ 1.82	- 17.92	+ 1 3.43	- 8 40 51.69
		W	...	1 22 33.0	3 19.4	42.00	48.30	...	312 24 6.22	+ 1.52	+ 22.59	- 1 3.49	
13	January 25, L. α Cassiopeiae	E	...	0 31 40.0	3 23.2	58.10	52.35	...	342 53 43.90	+ 1.07	+ 33.30	- 18.55	+56 0 52.65
		W	...	0 38 15.0	3 11.8	57.30	51.65	...	17 5 22.50	+ 0.46	- 29.68	+ 18.56	
14	γ Cassiopeiae	W	...	0 48 15.0	2 39.6	57.40	51.55	...	21 16 11.45	+ 0.41	- 14.80	+ 23.50	+60 12 2.87
		E	...	0 53 53.0	2 58.4	58.85	52.00	...	338 42 51.90	+ 1.12	+ 18.40	- 23.51	
15	δ Cassiopeiae	E	...	1 16 34.0	2 58.2	59.00	52.95	...	339 10 30.90	+ 1.64	+ 19.10	- 23.00	+59 44 23.71
		W	...	1 22 53.0	3 20.8	58.50	52.15	...	20 48 43.05	+ 1.08	- 24.25	+ 23.00	
16	ν Persei	W	...	1 20 12.0	2 54.0	58.50	52.10	...	9 13 41.98	+ 1.07	- 53.44	+ 9.84	+48 8 41.83
		E	...	1 35 14.0	3 8.0	59.00	52.35	...	350 45 15.10	+ 1.36	+ 1 2.36	- 9.85	
17	ϵ Cassiopeiae	E	...	1 44 34.0	2 55.7	60.30	52.85	...	335 42 59.20	+ 2.02	+ 14.36	- 27.32	+63 12 3.95
		W	...	1 51 44.0	4 14.3	58.60	52.00	...	24 16 24.68	+ 1.03	- 30.08	+ 27.35	
18	ζ Tauri	W	...	3 22 12.0	2 58.0	57.80	51.50	...	332 4 42.92	+ 0.52	+ 28.20	- 32.24	+11 0 19.59
		E	...	3 27 54.0	2 44.0	60.70	53.15	...	27 54 22.80	+ 2.29	- 23.93	+ 32.24	
19	δ Fornacis	E	...	3 35 16.0	3 9.9	61.05	53.05	...	71 7 6.28	+ 2.36	- 13.67	+ 56.53	- 32 14 59.40
		W	...	3 40 16.0	1 50.1	59.65	52.00	...	288 52 10.08	+ 1.40	+ 4.60	- 56.56	
20	ν Tauri	E	...	3 54 56.0	3 7.4	60.65	52.95	...	33 11 22.68	+ 2.19	- 27.08	+ 39.87	+ 5 43 13.53
		W	...	4 1 3.0	2 59.6	58.90	51.70	...	326 47 45.52	+ 1.00	+ 24.88	- 39.86	

Time	Ther 1882	Alt ther	Barom	Observation made at V with fixed thread, except as noted below					No	Zenith point	Red. to 1904.0.
<i>d h m</i>	<i>s</i>	<i>°</i>	<i>mm.</i>							<i>° ' "</i>	<i>"</i>
14 2 2	27.0	...	...						1	159 59 34.80	- 5.80
3 17	26.4	...	...						2	31.86	
3 15	26.3	...	...						3	34.61	
3 40	26.1	...	...						4	15.09	
3 59	26.0	27.6	29.604						5	15.42	
4 11	26.0	...	...						6	15.70	
4 14	25.6	...	...						7	16.57	
4 40	25.3	27.0	29.606						8	34.82	
21 0 16	48.6	49.2	29.728						9	34.82	
0 61	47.8	...	...						10	15.78	
1 5	47.3	...	...						11	16.15	
1 19	46.3	47.8	29.732						12	35.12	
25 0 15	14.9	36.2	30.164						13	15.78	
0 51	14.7	...	...						14	14.28	
1 20	13.4	...	...						15	15.76	
2 12	13.2	...	...						16	14.21	
3 48	12.3	34.9	30.144						17	35.62	
3 25	10.2	...	...						18	36.40	+ 7.28
1 19	29.9	11.1	30.144						19	15.51	+ 20.40
1 58	29.6	...	...						20	14.60	

Notes.

Poor observation

14 Clouds

15 W Clock time decreased 2m.

16 W Paint

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	α^2 Eridani	W	...	4 7 46.0	3 5.7	58.65	51.25	.....	313 16 42.52	+ 0.67	+ 19.91	- 1 4.62	- 7 48 21.55
		E	...	4 13 42.0	2 50.3	60.85	53.00	.....	46 42 24.65	+ 2.25	- 16.74	+ 1 4.61	
2	ϵ Tauri	E	...	4 20 9.0	2 52.4	61.35	52.90	.....	19 57 3.75	+ 2.38	- 34.95	+ 22.14	+ 18 57 58.15
		W	...	4 25 50.0	2 48.6	59.15	51.80	.....	340 2 4.02	+ 1.14	+ 33.42	- 22.14	
3	β Eridani	W	...	4 59 54.0	3 14.6	58.75	51.55	.....	315 52 3.05	+ 0.89	+ 22.98	- 59.12	- 5 12 51.32
		E	...	5 5 31.0	2 22.4	61.20	52.90	.....	44 6 54.50	+ 2.33	- 12.31	+ 59.10	
4	12 G. Columbæ	E	...	5 12 44.0	2 50.9	61.55	52.70	.....	66 21 4.28	+ 2.34	- 11.99	+ 2 18.59	- 27 28 21.85
		W	...	5 18 18.0	2 43.1	59.80	51.75	.....	293 38 2.68	+ 1.32	+ 10.94	- 2 18.60	
5	22 Camelop.	W	...	5 27 57.0	3 3.8	58.45	51.40	.....	17 22 43.65	+ 0.68	- 26.61	+ 19.10	+ 56 18 18.77
		E	...	5 33 58.0	2 57.2	61.10	52.60	.....	342 36 24.70	+ 2.14	+ 24.73	- 19.10	
6	1 Geminorum	W	...	5 55 0.0	3 18.3	58.60	51.35	.....	344 19 37.42	+ 0.73	+ 56.78	- 17.12	+ 23 15 58.48
		E	...	6 1 11.0	2 52.7	61.70	52.75	.....	15 39 17.55	+ 2.43	- 43.07	+ 17.11	
7	κ Orionis	E	...	6 8 0.0	3 4.3	61.10	52.70	.....	26 37 4.95	+ 2.20	- 31.43	+ 30.56	+ 12 17 45.70
		W	...	6 13 49.0	2 44.7	59.00	51.50	.....	333 22 9.02	+ 0.94	+ 25.10	- 30.56	
8	ν Geminorum	W	...	6 20 24.0	2 53.0	58.05	51.10	.....	341 20 16.00	+ 0.40	+ 37.24	- 20.59	+ 20 16 13.81
		E	...	6 26 13.0	2 56.0	61.40	52.80	.....	18 38 54.22	+ 2.35	- 38.55	+ 20.59	
9	January 27, L. β Andromedæ	E	...	1 4 .....	.....	61.05	50.65	25.885	3 47 15.10	+ 1.43	+ 0.23	+ 4.09	+ 35 6 48.94
		W	...	.....	.....	63.75	51.95	25.885	356 10 26.95	+ 2.93	- 0.23	- 4.10	
10	θ Ceti	W	...	1 16 2.0	3 10.8	61.90	51.00	.....	312 24 16.78	+ 1.17	+ 20.68	- 1 7.38	- 8 40 51.24
		E	...	1 23 40.0	4 27.2	61.00	50.50	.....	47 35 19.42	+ 0.60	- 40.55	+ 1 7.44	
11	ν Persei	E	...	1 29 10.0	2 55.8	61.90	51.05	.....	350 45 29.82	+ 1.19	+ 54.55	- 10.03	+ 48 8 40.33
		W	...	1 35 8.0	3 2.2	62.15	51.15	.....	9 13 50.22	+ 1.33	- 58.57	+ 10.04	
12	ϵ Cassiopeiæ	W	...	1 44 28.0	3 1.5	61.65	50.95	.....	24 16 11.10	+ 1.38	- 15.33	+ 27.85	+ 63 12 2.93
		E	...	1 50 29.0	2 59.5	60.45	50.25	.....	335 43 4.50	+ 0.30	+ 14.99	- 27.85	
13	67 Ceti	E	...	2 9 5.0	3 6.4	60.65	50.35	.....	45 46 12.70	+ 0.40	- 20.42	+ 1 3.43	- 6 52 0.25
		W	...	2 14 50.0	2 38.6	62.75	51.05	.....	314 13 9.65	+ 1.45	+ 14.78	- 1 3.46	
14	January 30, L. δ Cassiopeiæ	W	...	1 16 55.0	2 36.9	36.60	47.10	.....	20 48 35.92	+ 1.49	- 14.81	+ 22.90	+ 59 44 24.10
		E	...	1 22 35.0	3 3.1	45.50	52.10	.....	339 10 26.40	+ 6.88	+ 20.16	- 22.93	
15	α Arietis	E	...	1 58 43.0	3 2.5	55.50	51.70	.....	15 54 46.82	+ 3.08	- 47.42	+ 17.26	+ 23 0 31.50
		W	...	2 5 22.0	3 36.5	51.05	48.85	.....	344 3 59.88	+ 1.13	+ 6.71	- 17.28	
16	67 Ceti	W	...	2 9 52.0	2 19.3	49.70	48.40	.....	314 13 9.92	+ 0.46	+ 11.41	- 1 2.14	- 6 52 0.66
		E	...	2 17 20.0	5 8.7	55.45	51.80	.....	45 46 44.02	+ 4.02	- 56.00	+ 1 2.16	
17	ζ Persei	E	...	3 45 6.0	3 0.3	57.40	51.55	.....	7 20 17.85	+ 4.51	- 32.04	+ 7.86	+ 31 35 54.76
		W	...	3 50 28.0	2 21.7	52.80	49.45	.....	352 39 23.45	+ 1.99	+ 56.91	- 7.85	
18	ν Tauri	W	...	3 55 32.0	2 31.3	51.65	48.55	.....	326 47 55.12	+ 1.18	+ 17.65	- 39.87	+ 5 43 13.82
		E	...	4 1 0.0	2 56.7	56.50	51.35	.....	33 11 19.70	+ 4.14	- 24.08	+ 39.87	
19	A Eridani	E	...	4 7 2.0	2 47.9	57.55	51.70	.....	49 23 47.85	+ 4.67	- 15.48	+ 11.07	- 10 29 54.64
		W	...	4 12 52.0	3 2.1	52.55	48.65	.....	310 35 17.00	+ 1.51	+ 18.22	- 11.10	
20	35 B. Camelop.	E	...	4 33 7.0	2 51.3	56.35	51.45	.....	323 9 20.88	+ 4.14	+ 5.10	- 45.74	+ 75 46 8.82
		W	...	4 39 30.0	3 31.7	51.30	48.20	.....	36 49 49.98	+ 0.88	- 7.80	+ 45.75	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
25 4 11	29.7	.....	.....	9. Instrument in meridian; E. observation at I; W. observation assumed as at I with movable thread.	1	359 59 36.62	.....
4 23	29.4	.....	.....		2	34.88	.....
4 35	29.2	31.1	30.130		3	35.71	.....
5 3	29.1	.....	.....		4	34.78	+ 19.42
5 16	29.0	.....	.....		5	24.64	+ 1.16
5 45	28.8	.....	.....		6	35.92	.....
6 11	28.9	.....	.....		7	35.39	+ 12.00
6 23	28.9	30.8	30.106		8	35.83	.....
27 0 38	25.7	26.9	30.100		9	38.61	.....
1 20	23.8	26.0	30.106		10	39.08	.....
1 47	23.0	.....	.....		11	39.28	.....
2 12	22.8	24.9	30.122		12	38.28	.....
30 1 20	30.7	34.0	29.882		13	39.26	.....
1 49	29.8	.....	.....		14	38.00	.....
2 2	28.7	.....	.....	Notes.	15	35.54	.....
2 14	28.7	30.9	29.882	4. 5. Faint.	16	36.94	.....
3 48	25.3	28.1	29.874	7 E. One microscope reading changed from 13".9 to 6"	17	36.34	.....
4 10	25.1	.....	.....		18	36.86	.....
4 24	24.2	.....	.....		19	36.87	+ 15.78
1 36	24.4	.....	.....		20	36.60	.....

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	α^1 Orionis	W	...	4 44 22.0	2 44.7	50.95	48.05	...	335 9 39.35	+ 0.70	+ 26.58	- 28.29	+14 5 18.06
		E	...	4 49 53.0	2 46.3	55.65	51.15	...	24 49 30.45	+ 3.77	- 27.10	+ 28.29	
2	η^1 Orionis	E	...	4 55 58.0	3 7.7	56.45	51.45	...	23 38 52.65	+ 4.16	+ 35.93	+ 26.77	+15 16 5.58
		W	...	5 2 2.0	2 56.3	51.80	48.85	...	336 20 19.32	+ 1.34	+ 31.70	- 26.75	
3	γ^2 Camelop.	E	...	5 27 52.0	3 8.7	56.00	51.05	...	342 36 20.10	+ 3.81	+ 28.05	- 19.13	+56 18 20.25
		W	...	5 33 41.0	2 40.3	51.65	48.95	...	17 22 39.88	+ 1.35	- 20.24	+ 19.14	
4	κ Orionis	W	...	5 40 36.0	2 37.0	51.30	48.35	...	311 22 47.10	+ 0.94	+ 13.74	- 9.34	- 9 42 27.95
		E	...	5 46 3.0	2 50.0	55.05	50.95	...	48 36 24.82	+ 3.45	- 16.11	+ 9.38	
5	τ Geminorum	E	...	5 55 32.0	2 46.1	57.45	51.60	...	15 39 11.75	+ 4.58	- 39.85	+ 17.18	+23 15 58.86
		W	...	6 1 31.0	3 12.9	52.55	48.75	...	344 19 40.08	+ 1.57	+ 53.73	- 17.19	
6	k Orionis	W	...	6 7 57.0	3 7.2	51.00	48.15	...	333 22 3.15	+ 0.78	+ 32.42	- 30.72	+12 17 45.07
		E	...	6 14 4.0	2 59.8	55.95	51.45	...	26 37 3.88	+ 4.00	- 29.91	+ 30.72	
7	ν Geminorum	E	...	6 20 30.0	2 46.8	56.60	51.30	...	18 38 48.50	+ 4.14	- 34.63	+ 20.70	+20 16 14.08
		W	...	6 26 8.0	2 51.2	52.30	48.65	...	341 20 16.50	+ 1.41	+ 36.47	- 20.70	
8	S Monocerotis	W	...	6 32 34.0	3 8.5	50.75	47.90	...	331 3 17.02	+ 0.55	+ 30.69	- 33.90	+ 9 58 52.86
		E	...	6 38 31.0	2 48.5	55.35	50.80	...	28 55 48.92	+ 3.51	- 24.52	+ 33.92	
9	ρ^1 Lynceis	E	...	6 46 5.0	2 55.2	56.55	51.25	...	340 21 59.42	+ 4.11	+ 20.23	- 21.90	+58 32 50.98
		W	...	6 51 55.0	2 54.8	51.85	48.45	...	19 37 7.68	+ 1.17	- 20.14	+ 21.91	
10	δ Persei	E	...	3 35 16.0	2 48.4	55.10	49.55	...	6 57 2.65	+ 4.28	- 24.37	+ 7.22	+31 59 3.40
		W	...	3 41 10.0	3 5.6	52.50	48.50	...	353 1 45.25	+ 2.94	+ 42.42	- 7.22	
11	ζ Persei	W	...	3 46 44.0	1 8.4	50.15	47.10	...	352 40 8.92	+ 1.48	+ 13.28	- 7.59	+31 35 55.44
		E	...	3 50 55.0	3 2.6	55.00	49.30	...	7 20 21.10	+ 4.10	- 1 34.38	+ 7.62	
12	λ Persei	E	...	3 55 57.0	3 15.9	55.00	49.85	...	348 48 35.50	+ 4.38	+ 53.88	- 11.67	+50 5 32.26
		W	...	4 2 11.0	2 58.1	50.15	47.65	...	11 10 24.60	+ 1.70	- 44.56	+ 11.67	
13	μ Tauri	W	...	4 7 39.0	2 26.8	49.95	46.80	...	329 43 32.92	+ 1.24	+ 17.94	- 34.40	+ 8 38 56.62
		E	...	4 14 17.0	4 11.2	55.40	49.50	...	30 16 11.42	+ 4.33	- 52.50	+ 34.40	
14	α^1 Orionis	E	...	4 44 1.0	2 51.8	56.55	49.90	...	24 49 31.82	+ 4.94	- 28.93	+ 27.26	+14 5 17.88
		W	...	4 49 29.0	2 36.2	50.60	47.05	...	335 9 39.40	+ 1.59	+ 23.91	- 27.26	
15	κ Orionis	E	...	5 40 27.0	2 32.1	56.25	49.80	...	48 36 22.30	+ 4.75	- 12.89	+ 6.64	- 9 42 27.32
		W	...	5 45 34.0	2 34.9	50.00	46.75	...	311 22 45.00	+ 1.22	+ 13.37	- 6.62	
16	S Monocerotis	E	...	6 32 44.0	2 44.6	57.10	50.40	...	28 55 45.02	+ 5.38	- 23.40	+ 32.49	+ 9 58 53.58
		W	...	6 38 1.0	2 32.4	49.10	46.40	...	331 3 25.12	+ 0.77	+ 20.06	- 32.49	
17	ρ^1 Lynceis	W	...	6 46 4.0	2 42.3	47.95	46.05	...	19 37 7.68	+ 0.22	- 17.36	+ 20.97	+58 32 51.70
		E	...	6 52 4.0	3 17.7	56.20	50.25	...	340 21 51.52	+ 5.01	+ 25.75	- 20.98	
18	A Eridani	W	...	4 6 53.0	2 43.0	58.00	51.65	...	310 35 17.75	+ 6.30	+ 14.59	- 11.25	-10 29 54.13
		E	...	4 12 17.0	2 41.0	50.45	47.50	...	49 23 49.98	+ 1.79	- 14.24	+ 11.32	
19	γ^2 Camelop.	W	...	4 38 30.0	1 17.9	58.55	51.50	...	17 39 14.95	+ 6.40	- 4.67	+ 19.52	+56 35 16.00
		E	...	4 42 15.0	2 27.1	50.50	47.15	...	342 19 38.65	+ 1.63	+ 16.66	- 19.53	
20	γ^2 Camelop.	E	...	5 25 27.0	2 18.8	49.15	46.75	...	334 49 38.70	+ 0.99	+ 8.40	- 28.86	+64 5 35.46
		W	...	5 30 27.0	2 41.2	57.40	51.35	...	25 9 33.45	+ 5.97	- 11.33	+ 28.86	

Time	Ther. 1887	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below					No	Zenith point	Red. to 1904.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>mm</i>								
4 47	23.8	...	...						1	359 59 36.88	+ 9.39
4 59	24.1	26.2	29.868						2	36.63	
5 13	26.0	...	...						3	36.48	+ 0.41
5 41	23.6	...	...						4	36.99	
5 59	23.2	25.8	29.878						5	35.97	
6 11	23.6	...	...						6	37.16	+ 12.27
6 31	22.8	...	...						7	36.30	
6 36	22.4	...	...						8	38.10	
6 49	21.8	24.2	29.870						9	36.24	
7 14	16.1	14.9	29.874						10	36.58	+ 0.27
7 59	15.9	...	...						11	37.28	
8 11	16.4	17.1	29.870						12	37.75	+ 4.85
8 47	16.3	...	...						13	37.68	+ 9.84
8 59	17.0	17.6	29.876						14	36.16	+ 9.47
9 41	17.8	19.0	29.876						15	36.88	
10 31	18.1	...	...						16	36.48	
10 49	17.7	18.8	29.874						17	36.40	
11 49	14.8	16.1	29.914						18	38.12	+ 15.97
12 25	14.7	...	...						19	36.86	
1 28	12.1	14.1	29.916						20	36.09	- 2.14

Notes
 1 E. One microscope reading decreased 20"
 10 E. Had seeing; clouds.
 12 E. One microscope reading increased 20"
 18 Unsteady

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϕ^1 Draconis S. P.	W	...	5 41 24.0	1 57.0	57.35	51.00	.....	68 49 55.08	+ 5.80	+ 1.90	+2 37.69	+72 11 41.08
	February 6, L.	E	...	5 47 52.0	4 31.0	49.40	46.85	.....	291 9 22.60	+ 1.11	-10.21	-2 37.68	
2	γ Tauri	W	...	4 12 20.0	1 49.7	49.20	46.45	.....	336 28 10.90	+ 0.10	+12.33	- 25.11	+15 23 38.20
		E	...	4 16 21.0	2 11.3	53.05	47.80	.....	23 31 5.58	+ 2.00	-17.67	+ 25.11	
3	35 B. Camelop.	W	...	4 33 4.0	2 43.3	51.55	48.00	.....	36 49 51.05	+ 1.64	- 4.64	+ 43.18	+75 46 9.76
		E	...	4 38 40.0	2 52.7	54.45	49.85	.....	323 9 19.42	+ 3.49	+ 5.19	- 43.18	
4	π^1 Orionis	W	...	4 46 41.0	2 45.7	51.40	48.15	.....	331 4 12.82	+ 1.61	+23.72	- 31.86	+ 9 59 44.48
		E	...	4 52 38.0	3 11.3	54.60	49.95	.....	28 55 6.70	+ 3.58	-31.62	+ 31.88	
5	ϵ Leporis	E	...	4 59 0.0	2 13.8	54.75	49.95	.....	61 23 31.60	+ 3.64	- 7.99	+1 45.48	-22 30 18.84
		W	...	5 4 11.0	2 57.2	52.65	49.05	.....	298 35 30.82	+ 2.51	+14.02	-1 45.50	
6	α Orionis	W	...	5 13 51.0	2 50.8	51.50	48.50	.....	320 35 57.20	+ 1.87	+19.50	- 47.37	- 0 28 50.99
		E	...	5 19 16.0	2 34.2	54.50	49.70	.....	39 23 11.48	+ 3.43	-15.90	+ 47.37	
7	158 H ¹ . Cephei	E	...	5 27 54.0	3 17.0	55.30	50.25	.....	313 46 43.28	+ 3.94	+ 1.93	-1 0.17	+85 9 5.63
		W	...	5 33 24.0	2 13.0	52.15	48.70	.....	46 12 25.62	+ 2.13	- 0.88	+1 0.17	
8	35 Draconis S. P.	E	...	5 51 20.0	2 9.4	54.90	50.15	.....	295 55 17.78	+ 3.77	- 1.78	-1 58.22	+76 58 26.95
		W	...	5 56 36.0	3 6.6	52.50	48.65	.....	64 3 50.25	+ 2.27	+ 3.71	+1 58.22	
9	ϕ^1 Aurigæ	E	...	6 14 58.0	2 23.5	54.80	50.10	.....	349 34 18.82	+ 3.70	+31.49	- 10.62	+49 20 10.74
		W	...	6 19 51.0	2 29.5	52.45	48.70	.....	10 24 52.98	+ 2.25	-34.17	+ 10.62	
10	8 Lyncis	W	...	6 26 17.0	2 29.9	52.30	48.75	.....	22 38 1.32	+ 2.26	-11.79	+ 24.09	+61 33 55.26
		E	...	6 31 45.0	2 58.1	54.55	49.65	.....	337 21 2.60	+ 3.41	+16.65	- 24.10	
11	ϵ Geminorum	E	...	6 37 7.0	2 37.6	55.10	50.15	.....	25 54 59.90	+ 3.84	-23.49	+ 28.08	+12 59 45.61
		W	...	6 42 27.0	2 42.4	52.60	48.90	.....	334 4 7.05	+ 2.44	+24.94	- 28.08	
12	e Geminorum	W	...	6 47 23.0	1 41.3	51.60	48.45	.....	334 22 25.10	+ 1.83	+ 9.80	- 27.70	+13 17 47.80
		E	...	6 51 23.0	2 18.7	55.15	49.80	.....	25 36 53.62	+ 3.68	-18.37	+ 27.71	
13	γ Canis Majoris	E	...	6 56 31.0	2 44.5	55.35	50.25	.....	54 23 28.68	+ 3.98	-13.61	+1 20.58	-15 29 45.81
		W	...	7 1 34.0	2 18.5	52.50	48.80	.....	395 35 43.40	+ 2.33	+ 9.64	-1 20.56	
14	19 Lyncis	W	...	7 12 18.0	2 35.6	51.50	48.60	.....	16 32 1.78	+ 1.92	-20.46	+ 17.16	+55 27 39.86
	February 11, L.	E	...	7 17 35.0	2 41.4	54.00	49.55	.....	343 27 5.82	+ 3.19	+22.01	- 17.15	
15	157 H ¹ . Cephei	W	...	4 54 56.0	2 46.5	58.50	50.15	.....	46 53 29.95	+ 2.23	- 1.17	+1 5.31	+85 50 15.21
		E	...	4 59 56.0	2 13.5	57.20	49.90	.....	313 5 42.00	+ 1.69	+ 0.75	-1 5.33	
16	λ Leporis	E	...	5 12 33.0	2 26.0	58.50	50.10	.....	52 10 33.45	+ 2.19	-11.14	+1 18.76	-13 16 49.73
		W	...	5 17 22.0	2 23.0	61.50	51.25	.....	307 48 34.90	+ 3.74	+10.69	-1 18.76	
17	19 Camelop.	W	...	5 24 45.0	3 3.8	59.50	50.35	.....	25 9 39.40	+ 2.66	-14.72	+ 28.77	+64 5 36.18
		E	...	5 31 23.0	3 34.2	57.50	49.90	.....	334 49 23.98	+ 1.78	+20.00	- 28.79	
18	130 Tauri	E	...	5 38 56.0	2 44.5	58.20	50.05	.....	21 13 31.18	+ 2.09	-30.21	+ 23.82	+17 41 26.59
		W	...	5 43 58.0	2 17.5	60.95	50.95	.....	338 45 46.10	+ 3.44	+21.11	- 23.82	
19	35 Draconis S. P.	W	...	5 51 4.0	2 25.5	58.65	50.40	.....	64 3 44.45	+ 2.41	+ 2.25	+2 5.53	+76 58 26.75
		E	...	5 55 52.0	2 22.5	57.00	49.40	.....	295 55 27.68	+ 1.37	- 2.16	-2 5.52	
20.	24 Ursæ Minoris S. P.	E	...	6 4 0.0	1 48.1	56.60	49.40	.....	305 55 54.12	+ 1.25	- 0.32	-1 24.41	+86 59 36.37
		W	...	6 9 20.0	3 31.9	60.00	50.95	.....	54 3 15.90	+ 3.12	+ 1.23	+1 24.43	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
3 5 45	21.9	23.4	29.894					1	359 59 38.14	.....
6 4 14	48.0	49.0	29.660					2	30.02	.....
4 36	48.1	.....	.....					3	38.08	.....
4 50	47.9	.....	.....					4	38.42	+10.89
5 2	47.6	48.8	29.652					5	37.29	.....
5 23	47.7	.....	.....					6	38.79	+14.67
5 31	47.6	.....	.....					7	38.01	.....
5 54	47.5	48.8	29.656					8	38.00	.....
6 17	47.7	.....	.....					9	37.54	.....
6 40	47.1	.....	.....					10	37.22	.....
6 49	47.1	.....	.....					11	37.34	.....
6 59	46.9	.....	.....					12	37.84	+12.95
7 20	47.7	48.8	29.650					13	37.22	.....
II 4 36	28.0	29.8	30.114					14	37.14	.....
4 57	27.3	.....	.....					15	37.72	- 8.98
5 15	26.9	.....	.....					16	36.92	+18.05
5 28	26.9	28.1	30.110					17	36.54	- 3.19
5 41	26.3	.....	.....					18	36.86	+10.32
6 0	26.4	.....	.....					19	38.00	.....
6 17	26.0	27.8	30.100					20	37.66	+ 5.45

Note.
1, 3, 6. Unsteady.

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	50 Draconis s. p.	W	...	6 46 58.0	2 15.5	60.20	50.30	...	65 42 46.85	+ 2.84	+ 2.17	+2 15.35	+75 19 13.13
		E	...	6 52 14.0	3 0.5	55.95	48.25	...	294 16 25.50	+ 0.44	- 3.85	-2 15.39	
2	45 Geminorum	E	...	7 0 3.0	2 39.1	56.30	48.50	...	22 50 0.58	+ 0.70	- 26.59	+ 25.88	+16 4 51.03
		W	...	7 5 5.0	2 22.9	61.25	50.75	...	337 9 10.42	+ 3.42	+ 21.45	- 25.89	
3	7 Draconis s. p.	W	...	7 14 34.0	2 35.7	59.50	50.05	...	67 51 7.42	+ 2.51	+ 3.21	+2 30.17	+73 10 37.15
	Feb. 15, L.	E	...	7 20 3.0	2 53.3	55.35	48.15	...	292 8 4.78	+ 0.22	- 3.98	-2 30.20	
4	157 H ¹ . Cephei	E	...	4 51 30.0	6 11.4	59.05	50.00	...	313 5 34.78	+ 2.26	+ 5.81	-1 4.54	+85 50 15.89
		W	...	4 57 2.0	0 39.4	58.75	49.50	...	46 53 30.48	+ 1.90	- 0.07	+1 4.55	
5	λ Leporis	W	...	5 9 3.0	5 55.9	57.60	49.35	...	307 47 39.32	+ 1.46	+1 6.18	-1 17.88	-13 16 50.99
		E	...	5 16 12.0	1 13.1	57.20	48.95	...	52 10 28.08	+ 1.12	- 2.79	+1 17.86	
6	ν Aurigæ	W	...	5 45	...	59.50	49.90	26.405	0 10 27.18	+ 5.26	- 0.27	+ 0.21	+39 7 11.50
		E	...	...	...	57.10	48.95	...	359 47 42.18	+ 0.36	+ 0.27	- 0.21	
7	μ Orionis	E	...	5 53 46.0	3 10.2	58.60	49.55	...	29 16 9.50	+ 1.88	- 30.95	+ 33.99	+ 9 38 38.94
		W	...	5 59 42.0	2 45.8	60.50	50.00	...	330 43 6.82	+ 2.73	+ 23.52	- 33.99	
8	Groombridge 1004	W	...	6 6 10.0	3 46.0	58.70	49.15	...	47 48 49.68	+ 1.70	- 1.65	+1 6.90	+86 45 37.03
		E	...	6 11 8.0	1 12.0	56.70	48.40	...	312 10 21.85	+ 0.67	+ 0.17	-1 6.91	
9	6 Lyncis	E	...	6 19 22.0	2 56.2	57.70	48.60	...	340 40 53.00	+ 1.11	+ 20.97	- 21.28	+58 13 59.43
		W	...	6 24 38.0	2 19.8	60.60	49.95	...	19 18 8.62	+ 2.73	- 13.20	+ 21.28	
10	ε Geminorum	W	...	6 35 7.0	2 44.9	59.50	49.45	...	346 17 14.48	+ 2.12	+ 44.07	- 14.81	+25 13 25.19
		E	...	6 40 12.0	2 20.1	56.35	47.80	...	13 41 45.42	+ 0.27	- 31.81	+ 14.81	
11	θ Canis Majoris	E	...	6 46 58.0	2 36.0	56.65	48.10	...	50 49 12.28	+ 0.52	- 13.03	+1 14.46	-11 55 22.33
	Feb. 20, L.	W	...	6 51 56.0	2 22.0	61.90	50.45	...	309 9 56.62	+ 3.40	+ 10.80	-1 14.47	
12	ε Tauri	W	...	4 54 33.0	2 38.2	51.70	47.65	...	342 31 11.42	+ 0.17	+ 32.92	- 19.44	+21 27 4.61
		E	...	5 0 7.0	2 55.8	56.25	50.25	...	17 28 7.38	+ 2.91	+ 40.65	+ 19.45	
13	74 B. Camelop.	W	...	5 23 56.0	2 49.3	53.75	48.65	...	36 2 38.90	+ 1.33	- 5.35	+ 44.99	+74 58 58.82
		E	...	5 29 24.0	2 38.7	56.85	50.30	...	323 56 32.62	+ 3.15	+ 4.71	- 45.00	
14	γ Leporis	E	...	5 37 30.0	2 47.4	56.85	50.30	...	61 22 15.68	+ 3.15	- 12.51	+1 52.98	-22 29 6.60
		W	...	5 42 55.0	2 37.6	55.20	49.75	...	298 36 52.42	+ 2.35	+ 11.09	-1 53.01	
15	66 Orionis	W	...	5 57 13.0	2 30.9	53.75	48.50	...	325 14 24.85	+ 1.23	+ 16.90	- 42.92	+ 4 9 38.22
		E	...	6 1 30.0	1 46.1	55.65	49.55	...	34 44 39.92	+ 2.39	- 8.36	+ 42.92	
16	ε Geminorum	E	...	6 34 32.0	3 19.8	57.50	50.20	...	13 42 14.65	+ 3.31	-1 4.65	+ 15.11	+25 13 25.70
		W	...	6 40 18.5	2 26.7	56.10	49.55	...	346 17 24.25	+ 2.56	+ 34.88	- 15.11	
17	θ Canis Majoris	W	...	6 46 52.0	2 42.0	55.00	49.00	...	309 9 57.78	+ 1.93	+ 14.05	-1 15.96	-11 55 23.08
		E	...	6 52 24.0	2 50.0	55.70	49.40	...	50 49 14.35	+ 2.34	- 15.47	+1 15.98	
18	19 Lyncis	E	...	7 11 55.0	2 58.2	56.85	50.05	...	343 26 59.92	+ 3.04	+ 26.83	- 18.43	+55 27 42.76
		W	...	7 16 54.0	2 0.8	55.85	49.25	...	16 31 55.20	+ 2.34	- 12.33	+ 18.43	
19	225 B. Draconis s. p.	W	...	7 25 2.0	2 12.8	55.25	49.10	...	61 37 46.20	+ 2.06	+ 1.56	+1 54.54	+79 24 36.39
		E	...	7 30 18.0	3 3.2	56.00	49.60	...	298 21 25.42	+ 2.54	- 2.98	-1 54.56	
20	π Geminorum	E	...	7 41	...	56.00	50.05	26.520	5 14 39.98	+ 3.48	+ 0.22	+ 5.73	+33 38 57.11
		W	...	...	...	56.65	49.85	...	354 43 21.10	+ 3.60	- 0.22	- 5.73	

Time	Ther. 1882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
11 6 50	25.7	...	...	Instrument in meridian; W. observation at IX with movable thread; E. observation at IX with fixed thread.				1	359 59 36.96	...
7 1	25.6	...	...					2	34.08	+12.82
7 17	24.7	...	...					3	37.06	...
7 30	24.4	26.9	30.090	Instrument in meridian; E. observation at I with movable thread; W. observation at I with fixed thread.				4	37.58	-9.59
11 4 54	26.0	...	...					5	36.08	+18.92
8 11	25.7	...	...					6	37.49	...
5 14	24.5	...	...					7	36.75	+13.07
5 57	24.7	26.4	29.672					8	36.20	-5.45
6 9	24.3	...	...					9	36.62	+0.66
6 22	24.2	...	...					10	37.28	...
6 18	24.0	...	...					11	35.29	...
6 49	23.8	25.4	29.674					12	37.08	...
29 4 18	27.0	28.9	30.166					13	37.08	...
5 27	26.2	...	...					14	36.08	+21.82
5 40	25.9	27.9	30.356					15	38.46	+14.87
6 9	25.6	...	...					16	37.50	...
6 22	25.5	...	...					17	37.50	...
6 17	25.1	26.9	30.152					18	37.50	...
7 50	25.0	...	...					19	37.39	+3.22
7 14	24.5	26.4	30.158					20	38.26	...
7 28	24.6	...	...					

Note.
14. Unsteady.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ω^1 Cancri	W E	...	7 52 39.0 7 57 0.0	2 18.9 2 2.1	55.20 54.80	48.85 49.25	.....	346 43 11.95 13 15 53.00	+ 1.91 + 2.00	+32.14 -24.85	- 14.67 + 14.68	+25 39 9.87
2	173 B. Camelop.	E W	...	8 4 26.0 8 9 40.0	2 57.3 2 16.7	55.75 56.50	49.70 49.50	.....	322 52 36.38 37 6 32.80	+ 2.50 + 2.63	+ 5.33 - 3.17	- 47.10 + 47.13	+76 2 57.76
3	February 22, L. Tauri	E W	...	4 54 38.5 4 59 56.0	2 32.7 2 44.8	56.90 56.95	49.80 49.60	.....	17 27 56.62 342 31 3.52	+ 2.62 + 2.52	-30.67 +35.72	+ 18.57 - 18.58	+21 27 4.64
4	α Columbæ	W E	...	5 11 19.0 5 17 18.0	2 31.8 3 27.2	53.95 53.55	48.15 48.30	.....	286 7 47.22 73 51 31.22	+ 0.85 + 0.78	+ 8.34 -15.53	-3 21.41 +3 21.51	-34 59 44.87
5	74 B. Camelop.	E W	...	5 23 16.0 5 29 38.0	3 29.1 2 52.9	55.30 54.35	49.05 48.40	.....	323 56 29.98 36 2 40.60	+ 1.70 + 1.07	+ 8.17 - 5.58	- 42.97 + 42.99	+74 58 57.72
6	γ Leporis	W E	...	5 37 54.0 5 42 52.0	2 23.4 2 34.6	53.70 53.05	48.15 48.20	.....	298 36 49.62 61 22 23.32	+ 0.74 + 0.54	+ 9.18 -10.67	-1 47.95 +1 47.99	-22 29 8.18
7	99 B. Camelop.	E W	...	5 49 20.0 5 55 39.0	2 52.0 3 27.0	54.55 54.30	48.60 49.00	.....	332 1 32.50 27 57 42.85	+ 1.25 + 1.37	+10.51 -15.21	- 31.40 + 31.42	+66 53 40.41
8	ϕ Draconis S. P.	E W	...	6 19 30.0 6 25 10.0	2 24.7 3 15.3	54.65 54.70	49.15 49.15	.....	290 14 40.35 69 44 29.25	+ 1.54 + 1.55	- 3.04 + 5.53	-2 39.55 +2 39.62	+71 17 5.06
9	50 Draconis S. P.	E W	...	6 46 42.0 6 51 46.0	2 32.2 2 31.8	54.45 54.95	48.75 48.90	.....	294 16 15.20 65 42 54.25	+ 1.27 + 1.51	- 2.74 + 2.72	-2 11.11 +2 11.17	+75 19 9.86
10	63 Aurigæ	W E	...	7 5 ..... .....	..... .....	54.70 53.10	48.65 48.00	25.775 25.775	0 32 14.45 359 25 42.88	+ 0.57 - 0.25	- 0.28 + 0.28	+ 0.58 - 0.58	+39 28 33.12
11	66 Aurigæ	W E	...	7 17 ..... .....	..... .....	54.90 53.95	48.25 47.60	26.825 26.825	1 54 16.92 358 2 13.05	+ 0.44 - 0.49	- 0.29 + 0.29	+ 2.01 - 2.02	+40 51 20.74
12	225 B. Draconis S. P.	E W	...	7 25 6.0 7 29 42.0	2 9.0 2 27.0	53.95 54.90	48.10 48.45	.....	298 21 19.30 61 37 49.95	+ 0.80 + 1.31	- 1.48 + 1.91	-1 50.13 +1 50.13	+79 24 35.98
13	π Geminorum	W E	...	7 41 ..... .....	..... .....	54.85 52.70	48.15 47.60	26.120 26.120	354 42 30.02 5 14 59.42	+ 0.37 - 0.57	- 0.22 + 0.22	- 5.50 + 5.50	+33 38 56.67
14	ω^1 Cancri	E W	...	7 52 8.0 7 57 14.0	2 49.9 2 16.1	54.60 55.80	48.30 48.75	.....	13 16 15.30 346 43 10.75	+ 1.09 + 1.73	-48.08 +30.86	+ 14.08 - 14.08	+25 39 10.06
15	173 B. Camelop.	W E	...	8 4 46.0 8 10 10.0	2 37.2 2 46.8	53.85 53.45	47.95 47.70	.....	37 6 39.05 322 52 34.88	+ 0.69 + 0.43	- 4.19 + 4.72	+ 45.18 - 45.21	+76 2 59.58
16	February 23, L. ν Eridani	W E	...	4 28 46.0 4 33 22.0	2 34.7 2 1.3	55.90 51.50	49.10 47.10	.....	317 31 45.28 42 27 19.08	+ 2.54 + 0.09	+15.01 - 9.23	- 52.43 + 52.44	- 3 33 9.37
17	4 Camelop.	E W	...	4 37 33.0 4 42 38.0	2 17.5 2 47.5	52.50 55.80	47.40 49.00	.....	342 19 38.82 17 39 37.50	+ 0.57 + 2.44	+14.56 -21.60	- 18.27 + 18.28	+56 35 17.09
18	α Orionis	E W	...	5 29 18.0 5 34 11.0	1 52.3 3 0.7	53.10 57.40	47.75 49.55	.....	40 10 14.52 319 48 40.42	+ 0.91 + 3.21	- 8.29 +21.46	+ 48.46 - 48.46	- 1 16 2.86
19	February 24, L. 10 Camelop.	E W	...	4 51 38.0 4 57 27.0	3 4.9 2 44.1	55.25 54.40	48.60 48.00	.....	338 36 41.02 21 22 24.60	+ 2.31 + 1.71	+19.71 -15.52	- 22.99 + 22.99	+60 18 13.48
Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
20 7 55	23.7	...	...	10, 11, 13. Instrument in meridian, observation at IX with movable thread.							1	359 59 38.08	.....
8 7	23.0	25.4	30.302								2	38.25	.....
22 4 57	38.9	41.0	29.752								3	35.16	.....
5 14	38.4	...	...								4	36.49	.....
5 27	38.2	...	...								5	37.98	.....
5 40	37.9	39.9	29.762								6	36.38	+ 22.07
5 52	37.7	...	...								7	36.64	- 3.95
6 22	36.7	38.0	29.794								8	37.62	+ 8.01
6 35	36.6	...	...								9	36.14	.....
6 49	36.0	...	...								10	36.76	.....
7 27	34.4	...	...	Notes. 4. Very unsteady. 17, 18. Clouds.							11	35.78	.....
7 41	35.0	...	...								12	35.90	+ 3.71
7 55	34.7	...	...								13	36.64	.....
8 7	34.2	36.9	29.830								14	35.82	.....
23 4 31	48.5	...	...								15	37.28	.....
4 40	48.4	49.6	29.512								16	36.39	.....
4 55	47.9	49.5	29.520								17	36.15	.....
5 32	48.0	49.5	29.520								18	36.12	.....
24 4 55	38.7	40.8	29.606								19	36.92	.....

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	19 H. Camelop.	W	...	5 3 50.0	2 46.2	52.55	47.45	...	40 11 0.48	+ 0.89	- 3.43	+ 49.59	+79 7 26.48
		E	...	5 8 44.0	2 7.8	54.35	48.55	...	319 48 13.30	+ 2.09	+ 2.03	+ 49.60	
2	25 Orionis	E	...	5 16 34.0	3 1.5	55.50	48.70	...	37 9 12.02	+ 2.48	- 23.13	+ 44.54	+ 1 45 17.49
		W	...	5 22 9.0	2 33.5	54.85	47.85	...	322 50 3.78	+ 1.90	+ 16.54	+ 44.57	
3	158 H ¹ . Cephei	W	...	5 28 4.0	3 3.0	52.35	47.30	...	46 12 29.60	+ 0.71	- 1.66	+ 1.32	+85 9 8.98
		E	...	5 33 16.0	2 9.0	54.45	48.40	...	313 46 43.78	+ 1.96	+ 0.83	- 1.33	
4	2 Aurigæ	E	...	5 45	...	55.50	49.05	26.690	359 46 23.12	+ 3.33	+ 0.27	+ 0.21	+39 7 11.67
		W	...	...	...	54.40	47.90	26.690	0 10 14.30	+ 2.38	- 0.27	+ 0.20	
5	φ Draconis S. P.	W	...	6 19 32.0	2 22.8	51.60	46.85	...	69 44 34.28	+ 0.25	+ 2.96	+ 38.54	+71 17 4.54
		E	...	6 25 16.0	3 21.2	53.85	48.05	...	290 14 41.18	+ 1.59	- 5.87	- 2 38.56	
6	156 H ¹ . Draconis S. P.	E	...	6 31 41.0	2 27.9	53.55	48.30	...	296 25 7.68	+ 1.63	- 2.25	- 1 58.16	+77 28 14.12
		W	...	6 37 10.0	3 1.1	53.00	47.70	...	63 34 4.78	+ 1.09	+ 3.37	+ 1 58.18	
7	24 H. Camelop.	W	...	6 43 14.0	2 43.7	52.60	47.80	...	38 9 42.05	+ 1.12	- 4.11	+ 46.34	+77 6 4.52
		E	...	6 48 36.0	2 38.3	52.35	47.80	...	321 49 31.08	+ 1.03	+ 3.84	- 46.36	
8	7 Canis Majoris	W	...	6 56 27.0	2 48.1	53.05	47.95	...	305 35 40.48	+ 1.34	+ 14.21	- 1 22.30	-15 29 48.48
		E	...	7 2 1.0	2 45.9	52.55	47.70	...	54 23 34.38	+ 1.04	- 13.84	+ 1 22.34	
9	66 Aurigæ	E	...	7 17	...	54.50	48.65	26.465	358 2 26.38	+ 2.81	+ 0.29	- 2.00	+40 51 20.60
		W	...	...	...	54.35	48.55	26.465	1 54 31.02	+ 2.71	- 0.29	+ 1.99	
10	n ¹ Puppis	W	...	7 28 4.0	2 1.5	53.00	47.95	...	297 49 52.45	+ 1.34	+ 6.51	- 1 51.52	-23 16 11.80
		E	...	7 33 40.0	3 34.5	52.70	48.00	...	62 9 33.12	+ 1.24	- 20.28	+ 1 51.55	
11	4 Puppis	E	...	7 38 36.0	2 46.0	53.40	48.20	...	53 13 55.60	+ 1.58	- 14.14	+ 1 19.01	-14 20 7.44
		W	...	7 44 7.0	2 45.0	54.50	48.50	...	306 45 16.92	+ 2.05	+ 13.97	- 1 19.01	
12	53 Camelop.	W	...	7 50 34.0	2 48.0	52.90	47.85	...	21 39 21.95	+ 1.22	- 15.93	+ 23.49	+60 35 9.81
		E	...	7 56 3.0	2 41.0	53.40	48.45	...	338 19 51.50	+ 1.71	+ 14.63	- 23.49	
13	ζ Cancri	E	...	8 3 33.0	2 59.9	54.40	48.60	...	20 59 4.90	+ 2.06	+ 36.48	+ 22.69	+17 56 0.94
		W	...	8 10 18.0	3 45.1	55.00	48.45	...	338 59 45.18	+ 2.22	+ 57.10	- 22.70	
14	Feb. 27, L. 10 Camelop.	W	...	4 49 2.0	5 40.8	53.75	48.35	...	21 23 15.15	+ 1.87	- 1 6.88	+ 23.84	+60 18 12.85
		E	...	4 57 2.0	2 19.2	51.20	47.00	...	338 35 25.92	+ 0.36	+ 11.15	- 23.87	
15	19 H. Camelop.	E	...	5 3 31.0	3 4.9	52.70	47.75	...	319 48 13.08	+ 1.27	+ 4.25	- 51.45	+79 7 26.67
		W	...	5 9 28.0	2 52.1	54.50	48.50	...	40 10 58.15	+ 2.17	- 3.07	+ 51.40	
16	θ ¹ Orionis	E	...	5 28 24.0	1 59.2	52.25	47.80	...	44 21 30.48	+ 1.11	- 8.58	+ 59.65	- 5 27 27.83
		W	...	5 33 26.0	3 2.8	55.80	48.95	...	315 37 30.38	+ 2.84	+ 20.18	- 59.66	
17	ζ Leporis	W	...	5 39 39.0	2 47.0	54.45	48.45	...	306 13 42.75	+ 2.17	+ 14.18	- 1 23.20	-14 51 46.41
		E	...	5 44 51.0	2 25.0	51.80	47.20	...	53 45 28.80	+ 0.67	- 10.69	+ 1 23.20	
18	ξ Orionis	E	...	6 3 21.0	2 57.9	52.95	47.75	...	24 41 16.90	+ 1.31	- 31.16	+ 28.09	+14 13 38.83
		W	...	6 8 54.0	2 35.1	56.70	49.30	...	335 18 0.62	+ 3.34	+ 23.09	- 28.10	
19	8 Monocerotis	W	...	6 15 30.0	3 0.8	54.70	48.30	...	325 42 53.22	+ 2.14	+ 24.54	- 41.65	+ 4 38 16.20
		E	...	6 20 55.0	2 24.2	52.20	47.35	...	34 16 12.22	+ 0.83	- 15.61	+ 41.67	
20	23 H. Camelop.	E	...	6 26 56.0	2 49.4	53.05	48.00	...	319 15 29.52	+ 1.47	+ 3.35	- 52.66	+79 40 14.43
		W	...	6 32 6.0	2 20.6	55.05	48.90	...	40 43 44.32	+ 2.58	+ 2.31	+ 52.69	

Time	Ther 1882	At ther	Barom	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>								<i>° ' "</i>	<i>"</i>
24 5 6	38.5			4.9 Instrument in meridian, observation at I with movable thread.						1	359 59 37.68	...
5 19	37.9			14 E Instrument in meridian, observation assumed as with movable thread at 27 000 rev.						2	16 78	+15.12
5 31	37.6	39.2	29.598							3	37.60	...
6 6	37.0									4	16.86	...
6 22	36.8	38.8	29.604							5	37.18	+ 8.36
6 34	36.7									6	18.16	+ 7.39
6 46	36.7									7	17.50	- 3.47
6 59	36.2	37.4	29.618							8	18.82	...
7 31	18.9									9	37.58	...
7 47	18.9									10	17.20	+21.24
7 51	18.9									11	17.99	+19.68
8 7	18.9	37.0	29.634							12	17.54	...
27 4 01	18.2	32.3	30.202							13	17.48	...
5 6	19.6			Notes						14	17.76	...
5 31	19.0			c 11.13. Unsteady						15	18.10	...
5 47	19.8			Mean of the close double						16	18.20	+17.68
6 6	19.7	30.9	30.218							17	18.94	...
6 18	19.4									18	17.34	+12.13
6 36	19.0									19	18.68	...
										20	19.48	...

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	24 H. Camelop.	E	...	6 43 32.0	2 25.5	52.50	47.25	...	321 49 33.42	+ 0.93	+ 3.24	- 48.11	+77 6 5.35
		W	...	6 48 35.0	2 37.5	54.70	48.85	...	38 9 40.15	+ 2.45	- 3.80	+ 48.11	
2	63 Aurigæ	E	...	7 5	...	52.45	47.40	27.880	359 24 16.22	+ 1.66	+ 0.28	- 0.59	+39 28 33.05
		W	...	...	...	54.80	48.60	27.880	0 30 47.05	+ 3.04	- 0.28	+ 0.59	
3	τ Draconis S. P.	E	...	7 14 42.0	2 28.5	52.45	47.75	...	292 8 0.20	+ 1.18	- 2.92	- 29.68	+73 10 33.33
		W	...	7 19 16.0	2 5.5	54.80	48.55	...	67 51 14.75	+ 2.31	+ 2.09	+ 29.71	
4	ν Geminorum	W	...	7 26 53.5	2 57.4	53.45	47.70	...	348 9 58.52	+ 1.47	+58.02	- 12.84	+27 6 24.25
	March 1, L.	E	...	7 32 22.0	2 31.1	51.30	46.90	...	11 48 58.88	+ 0.33	-42.11	+ 12.84	
5	25 Orionis	W	...	5 16 31.0	3 4.5	48.55	48.20	...	322 49 59.78	+ 0.22	+23.89	- 44.63	+ 1 45 17.42
		E	...	5 22 18.0	2 42.5	51.40	49.90	...	37 9 9.62	+ 1.94	-18.54	+ 44.66	
6	θ ¹ Orionis	W	...	5 28 18.0	2 5.3	49.40	48.30	...	315 37 41.92	+ 0.52	+ 9.48	- 57.61	- 5 27 26.77
		E	...	5 33 39.0	3 15.7	51.75	49.80	...	44 21 44.58	+ 2.03	-23.13	+ 57.62	
7	ζ Leporis	E	...	5 39 36.0	2 50.0	52.35	49.95	...	53 45 32.00	+ 2.29	-14.69	+ 20.33	-14 51 45.73
		W	...	5 45 36.0	3 10.0	51.10	49.00	...	306 13 35.80	+ 1.42	+18.35	- 20.37	
8	99 B. Camelop.	W	...	5 50 28.0	1 43.8	49.15	47.95	...	27 57 33.30	+ 0.25	- 3.83	+ 31.35	+66 53 40.77
		E	...	5 55 18.0	3 6.2	52.00	49.95	...	332 1 29.65	+ 2.18	+12.31	- 31.36	
9	ξ Orionis	W	...	6 3 33.0	2 45.9	49.40	48.15	...	335 17 59.75	+ 0.47	+27.10	- 27.17	+14 13 38.87
		E	...	6 8 59.0	2 40.1	52.20	50.00	...	24 41 11.45	+ 2.26	-25.23	+ 27.19	
10	8 Monocerotis	E	...	6 15 38.0	2 52.9	53.55	50.60	...	34 16 15.98	+ 2.95	-22.44	+ 40.31	+ 4 38 17.15
		W	...	6 21 11.0	2 40.1	51.20	48.70	...	325 42 57.65	+ 1.27	+19.24	- 40.32	
11	23 H. Camelop.	W	...	6 27 6.0	2 39.2	49.55	47.80	...	40 43 47.62	+ 0.33	- 2.96	+ 50.96	+79 40 14.71
		E	...	6 32 44.0	2 58.8	52.55	50.10	...	319 13 56.65	+ 2.45	+ 3.73	- 51.00	
12	18 Monocerotis	E	...	6 39 51.0	2 50.4	53.90	50.60	...	36 23 41.38	+ 3.14	-20.74	+ 43.79	+ 2 30 47.19
		W	...	6 44 54.0	2 12.6	51.35	49.00	...	323 35 38.48	+ 1.50	+12.55	- 43.85	
13	105 G. Canis Majoris	W	...	6 52 2.0	2 28.0	49.55	48.05	...	295 48 49.55	+ 0.41	+ 9.33	- 2.39	-25 17 23.41
		E	...	6 56 46.0	2 16.0	51.50	49.30	...	64 10 20.75	+ 1.64	- 7.88	+ 2.46	
14	22 Monocerotis	E	...	7 4 8.0	2 39.9	54.05	50.35	...	39 14 36.72	+ 3.01	-17.15	+ 48.66	- 0 20 16.80
		W	...	7 9 14.0	2 26.1	52.35	48.50	...	320 44 37.22	+ 1.53	+14.32	- 48.69	
15	λ Ursæ Minoris S. P.	W	...	7 17 26.0	0 28.3	49.35	47.10	...	52 3 25.68	- 0.11	+ 0.01	+ 16.33	+88 59 39.54
		E	...	7 21 40.0	4 42.3	52.15	49.45	...	307 55 49.38	+ 2.00	- 0.76	- 16.33	
16	25 Monocerotis	E	...	7 29 48.0	2 32.6	52.95	50.05	...	42 48 14.62	+ 2.48	-14.50	+ 55.22	- 3 54 3.71
		W	...	7 35 10.0	2 49.4	53.40	49.20	...	317 10 52.28	+ 2.23	+17.88	- 55.25	
17	ξ Argûs	W	...	7 42 6.0	2 59.9	51.35	48.40	...	296 28 37.68	+ 1.15	+13.94	- 59.32	-24 37 27.41
		E	...	7 48 7.0	3 1.1	51.90	49.15	...	63 30 34.55	+ 1.71	-14.13	+ 59.39	
18	χ Geminorum	E	...	7 54 36.0	2 51.9	53.55	49.65	...	10 51 57.88	+ 2.56	-58.68	+ 11.48	+28 3 39.44
	March 2, L.	W	...	8 0 10.2	2 42.3	52.05	48.80	...	349 7 16.42	+ 1.61	+52.32	- 11.49	
19	γ Orionis	W	...	5 16 55.0	2 53.6	48.70	49.10	...	327 20 7.20	+ 0.53	+23.55	- 38.18	+ 6 15 33.21
		E	...	5 22 23.0	2 34.4	48.30	49.10	...	32 39 0.02	+ 0.35	-18.63	+ 38.19	
20	ε Orionis	W	...	5 28 25.0	2 45.2	49.45	49.35	...	319 48 49.08	+ 0.84	+17.94	- 50.33	- 1 16 2.81
		E	...	5 34 9.0	2 58.8	47.50	49.05	...	40 10 27.05	+ 0.05	-21.02	+ 50.34	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1004.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
27 6 46	28.8	...	...	2. Instrument in meridian, observation at I with movable thread.					1	359 59 38.20	- 4.01
7 17	28.4	...	...	11 E. Instrument in meridian, observation assumed as with movable thread at 27,000 rev.					2	37.88	...
7 30	28.3	29.7	30.228						3	38.82	...
1 5 19	43.2	45.0	29.990						4	37.56	+10.30
5 31	42.9	...	...						5	38.47	+15.17
5 43	42.6	...	...						6	37.70	+17.70
6 6	41.7	...	...						7	37.56	...
6 18	41.3	43.2	30.002						8	36.92	- 4.83
6 30	41.1	...	...						9	37.91	+12.05
6 42	39.0	...	...						10	37.32	...
6 54	38.6	...	...						11	37.88	...
7 7	37.6	...	...						12	38.12	...
7 20	37.9	...	...						13	36.94	+23.06
7 45	36.8	39.0	29.990	Notes.					14	37.81	...
8 8	35.9	...	...	19. Faint clouds.					15	38.10	...
2 5 15	36.4	38.0	29.892	20. Clouds.					16	37.48	...
5 37	35.8	...	...						17	37.48	...
									18	36.05	...
									19	36.52	...
									20	36.98	...

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Orionis	E W	...	5 47 2.0 5 52 27.0	2 46.3 2 38.7	50.85 52.05	50.20 50.55	.....	31 31 28.15 328 27 41.12	+ 1.74 + 2.32	-22.25 +20.27	+ 36.62 - 36.62	+ 7 23 8.05
2	μ Geminorum	W E	...	6 14 17.5 6 19 46.5	2 41.8 2 47.2	49.65 49.50	49.75 50.10	.....	343 37 38.75 16 21 35.35	+ 1.15 + 1.27	+36.41 -38.88	- 17.55 + 17.55	+22 33 38.37
3	23 Camelop. March 4. L.	W E	...	5 33 9.0 5 37 50.0	2 0.2 2 40.8	53.05 49.65	51.25 50.20	.....	22 29 48.00 337 29 14.65	+ 3.26 + 1.61	- 7.66 +13.71	+ 25.40 - 25.41	+61 25 48.86
4	ν Orionis	W E	...	5 59 2.0 6 4 40.0	2 53.5 2 44.5	52.20 49.25	51.05 49.85	.....	335 50 53.48 24 8 15.28	+ 2.84 + 1.25	+30.20 -27.15	- 27.55 + 27.56	+14 46 37.66
5	7 Monocerotis	E W	...	6 12 0.0 6 17 46.0	2 55.4 2 50.6	50.25 54.00	50.00 51.45	.....	46 41 19.55 313 17 50.82	+ 1.70 + 3.67	-17.77 +16.81	+ 1 5.19 - 1 5.21	- 7 47 14.65
6	8 Lyncis	E W	...	6 25 40.0 6 31 46.0	3 6.2 2 59.8	49.90 52.85	49.55 51.15	.....	337 21 1.18 22 38 7.48	+ 1.35 + 3.07	+18.19 -16.96	- 25.67 + 25.67	+61 33 58.74
7	18 Monocerotis	W E	...	6 39 41.0 6 45 25.0	3 0.4 2 43.6	52.30 48.70	50.80 49.25	.....	323 35 29.02 36 23 41.95	+ 2.78 + 0.85	+23.24 -19.12	- 45.38 + 45.39	+ 2 30 46.94
8	105 G. Canis Majoris	E W	...	6 51 46.0 6 58 28.0	2 44.1 3 57.9	49.75 54.30	49.65 51.50	.....	64 10 20.90 295 48 35.10	+ 1.33 + 3.74	-11.47 +24.12	+2 6.86 -2 6.90	-25 17 24.14
9	22 Monocerotis	W E	...	7 4 1.0 7 9 27.0	2 47.0 2 39.0	53.00 49.15	51.40 49.40	.....	320 44 32.92 39 14 37.55	+ 3.26 + 1.01	+18.71 -16.96	- 50.36 + 50.35	- 0 20 17.07
10	λ Ursæ Minoris s. p.	E W	...	7 16 4.0 7 22 20.0	0 57.0 5 19.0	50.50 53.45	49.60 51.40	.....	307 55 51.05 52 3 19.78	+ 1.60 + 3.45	- 0.03 + 0.96	-1 18.96 +1 18.96	+88 59 38.62
11	25 Monocerotis	W E	...	7 29 50.0 7 35 2.0	2 30.7 2 41.3	53.30 49.00	51.05 48.95	.....	317 10 56.85 42 48 18.00	+ 3.20 + 0.73	+14.15 -16.21	- 57.11 + 57.12	- 3 54 4.64
12	γ Geminorum	W E	...	7 54 54.0 8 0 8.0	2 34.0 2 40.0	51.90 49.05	50.30 49.15	.....	349 7 22.72 10 51 53.50	+ 2.38 + 0.92	+47.11 -50.85	- 11.87 + 11.88	+28 3 39.08
13	20 Puppis	E W	...	8 5 55.0 8 11 26.0	2 50.8 2 40.2	49.30 54.65	48.90 51.25	.....	54 23 56.42 305 35 16.58	+ 0.87 + 3.75	-14.67 +12.91	+1 26.28 -1 26.32	-15 30 14.35
14	30 Monocerotis	W E	...	8 18 16.0 8 23 20.0	2 26.4 2 37.6	52.40 48.55	50.70 48.95	.....	317 29 9.15 42 30 5.75	+ 2.74 + 0.57	+13.43 -15.56	- 56.69 + 56.72	- 3 35 52.78
15	27 B. Ursæ Majoris	E W	...	8 29 12.0 8 35 1.0	2 50.2 2 58.8	49.95 54.05	49.35 50.85	.....	345 51 50.88 14 7 24.28	+ 1.30 + 3.36	+30.28 -33.41	- 15.60 + 15.61	+53 2 48.13
16	γ Orionis March 5. L.	E W	...	5 17 11.0 5 22 25.0	2 37.5 2 36.5	49.50 50.10	50.15 50.30	.....	32 38 58.45 327 20 12.12	+ 0.93 + 1.17	-19.39 +19.15	+ 39.21 - 39.22	+ 6 15 33.65
17	ζ Orionis	E W	...	5 32 58.5 5 38 22.5	2 46.1 2 37.9	50.25 50.20	50.35 50.00	.....	40 54 8.78 319 5 4.00	+ 1.25 + 1.09	-17.86 +16.14	+ 53.05 - 53.06	- 1 59 51.88
18	δ Leporis	W E	...	5 44 15.0 5 49 43.0	2 46.2 2 41.8	49.00 49.25	49.50 49.80	.....	300 12 18.45 59 46 54.42	+ 0.42 + 0.67	+12.67 -12.01	-1 44.98 +1 45.03	-20 53 34.14
19	ν Orionis	E W	...	5 59 4.0 6 4 42.5	2 51.4 2 47.1	50.45 49.85	50.40 49.75	.....	24 8 15.98 335 50 56.15	+ 1.34 + 0.85	-29.47 +28.02	+ 27.51 - 27.52	+14 46 37.71

Time	Ther 1892	Alt ther	Barom	Observation made at V with fixed thread, except as noted below.								No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>										<i>° ' "</i>	<i>"</i>
2 5 11	15.2	...	...									1	359 59 35.68	.....
6 18	35.0	36.1	29.850									2	37.02	.....
4 5 24	20.1	31.7	30.292									3	36.78	- 4.22
5 16	20.1	...	...									4	37.96	.....
5 48	28.4	...	...									5	37.38	.....
6 2	28.1	...	...									6	37.16	.....
6 16	27.8	30.0	30.300									7	39.16	.....
6 29	27.7	...	...									8	36.84	+23.37
6 41	27.6	...	...									9	38.24	.....
6 55	26.8	...	...									10	38.40	.....
7 7	26.9	...	...									11	38.36	.....
7 19	27.0	28.6	30.318									12	37.90	.....
7 32	26.8	...	...									13	37.91	.....
7 58	26.8	...	...									14	38.06	.....
8 9	25.4	...	...									15	38.35	+ 5.21
8 21	25.4	...	...									16	36.21	.....
8 32	24.8	27.3	30.338									17	36.70	.....
5 5 21	12.2	33.2	30.432									18	37.14	+22.50
5 16	31.8	...	...									19	36.43	.....
5 47	11.1	...	...									
6 8	10.8	...	...									
6 15	10.7	12.8	30.436											

Notes
1. Clouds.
2. Very faint; thick.

No.	Date, observer, and object.	Circ. cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	March 9, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Orionis	W	...	5 33 0.0	2 44.6	...	52.65	...	319 4 57.80	+ 1.19	+17.54	- 50.20	- 1 59 53.66
		E	...	5 38 29.0	2 44.4	...	51.95	...	40 54 13.75	+ 0.47	-17.50	+ 50.23	
2	α Orionis	W	...	5 46 57.5	2 50.8	54.70	53.75	...	328 27 40.10	+ 2.46	+23.47	- 35.61	+ 7 23 7.49
		E	...	5 52 50.5	3 8.2	51.90	52.90	...	31 31 40.25	+ 1.34	-28.50	+ 35.64	
3	δ Ursæ Minoris S. P.	E	...	6 0 32.0	2 23.5	52.65	52.50	...	305 32 55.72	+ 1.30	- 0.63	-1 21.15	+86 36 41.07
		W	...	6 5 32.0	2 36.5	56.60	54.65	...	54 26 14.52	+ 3.35	+ 0.76	+1 21.17	
4	7 Monocerotis	W	...	6 12 26.0	2 29.3	55.30	53.55	...	313 17 52.65	+ 2.52	+12.87	-1 1.69	- 7 47 14.85
		E	...	6 18 0.0	3 4.7	51.60	52.40	...	46 41 26.32	+ 1.01	-19.71	+1 1.74	
5	13 Monocerotis	E	...	6 24 46.5	2 46.3	53.00	52.60	...	31 30 40.75	+ 1.44	-22.26	+ 35.73	+ 7 23 57.79
		W	...	6 30 14.0	2 41.2	57.00	54.25	...	328 28 29.50	+ 3.25	+20.92	- 35.74	
6	43 Camelop.	W	...	6 40 22.0	2 50.8	54.85	53.40	...	30 3 58.52	+ 2.33	- 8.85	+ 33.81	+69 0 4.06
		E	...	6 45 43.0	2 30.2	50.25	52.10	...	329 55 17.45	+ 0.52	+ 6.85	- 33.83	
7	25 H. Camelop.	W	...	7 7 56.0	2 54.1	56.05	54.00	...	43 39 20.72	+ 2.91	- 2.39	+ 55.87	+82 35 56.13
		E	...	7 13 20.0	2 29.9	50.45	51.90	...	316 19 51.78	+ 0.48	+ 1.78	- 55.90	
8	ρ Geminorum	E	...	7 23 ....	...	52.35	52.55	27.695	6 54 24.90	+ 1.97	+ 0.21	+ 7.15	+31 58 24.51
		W	...	...	...	57.10	54.65	27.695	353 0 53.10	+ 4.21	- 0.21	- 7.15	
9	24 Lyncis	W	...	7 31 46.0	2 58.3	54.45	53.40	...	20 0 25.20	+ 2.18	-20.33	+ 21.41	+58 56 7.05
		E	...	7 37 27.0	2 42.7	49.65	51.60	...	339 58 52.05	+ 0.10	+16.94	- 21.43	
10	9 Puppis	E	...	7 44 10.0	2 51.0	51.55	52.10	...	52 32 47.38	+ 0.83	-15.18	+1 16.79	-13 38 55.87
		W	...	7 49 58.0	2 48.0	57.65	54.30	...	307 26 23.50	+ 3.44	+14.66	-1 16.81	
11	4 B. Ursæ Minoris	W	...	7 58 20.0	4 32.3	55.65	54.10	...	49 58 31.45	+ 2.84	- 0.77	+1 10.10	+88 55 21.43
		E	...	8 3 6.0	0 13.7	50.10	51.70	...	310 0 43.90	+ 0.27	0.00	-1 10.10	
12	d ¹ Cancri	E	...	8 14 49.5	2 53.1	53.85	53.05	...	20 16 49.92	+ 1.87	-34.75	+ 21.80	+18 38 14.53
		W	...	8 20 17.5	2 34.9	60.30	55.30	...	339 42 24.00	+ 4.59	+27.82	- 21.81	
13	181 B. Camelop.	W	...	8 26 18.0	2 37.4	58.00	54.80	...	35 1 37.38	+ 3.80	- 5.06	+ 41.35	+73 57 56.35
		E	...	8 31 13.0	2 17.6	51.25	52.50	...	324 57 34.58	+ 0.97	+ 3.87	- 41.35	
14	ε Cancri	E	...	8 41 ....	...	53.55	52.65	27.455	9 46 23.85	+ 2.32	+ 0.18	+ 10.21	+29 6 30.38
		W	...	...	...	59.10	55.35	27.455	350 9 9.35	+ 5.07	- 0.18	- 10.22	
15	ρ Ursæ Majoris	W	...	8 50 47.0	2 58.7	56.25	53.85	...	29 4 7.90	+ 2.85	-10.44	+ 32.84	+68 0 12.13
		E	...	8 55 39.0	1 53.3	51.35	51.65	...	330 55 10.25	+ 0.57	+ 4.20	- 32.84	
16	March 10, L. δ Ursæ Minoris S. P.	E	...	5 55 16.0	7 39.9	53.95	51.35	...	305 33 2.48	+ 0.30	- 6.52	-1 21.98	+86 36 40.95
		W	...	6 0 26.0	2 29.9	55.85	52.35	...	54 26 15.15	+ 1.26	+ 0.69	+1 21.98	
17	δ Ursæ Minoris S. P.	W	...	6 4 2.0	1 6.1	55.65	52.05	...	54 26 14.72	+ 1.06	+ 0.13	+1 22.00	+86 36 41.23
		E	...	6 7 20.0	4 24.1	55.00	51.15	...	305 32 57.35	+ 0.46	- 2.15	-1 22.00	
18	μ Geminorum	E	...	6 14 6.5	2 52.7	53.55	51.00	...	16 21 37.72	+ 0.03	-41.48	+ 17.26	+22 33 38.43
		W	...	6 19 40.5	2 41.3	55.55	52.05	...	343 37 37.12	+ 1.06	+36.18	- 17.26	
19	13 Monocerotis	W	...	6 24 45.0	2 47.8	55.40	51.65	...	328 28 31.00	+ 0.81	+22.67	- 36.02	+ 7 23 58.31
		E	...	6 30 17.5	2 44.7	55.15	51.10	...	31 30 40.48	+ 0.47	-21.84	+ 36.03	
20	March 16, L. δ Ursæ Minoris S. P.	W	...	5 56 4.0	6 54.3	50.80	51.50	...	54 26 9.92	+ 2.21	+ 5.28	+1 23.54	+86 36 39.76
		E	...	6 0 42.0	2 16.3	49.35	51.25	...	305 32 56.15	+ 1.76	- 0.57	-1 23.56	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
9 5 36	46.9	48.8	29.744	8, 14. Instrument in meridian, observation at I with movable thread.	1	359 59 36.64	.....
5 50	46.2	...	...		2	39.58	.....
6 4	45.8	...	...		3	37.52	.....
6 17	45.0	...	...		4	37.86	.....
6 28	44.6	46.6	29.764		5	36.80	+14.87
6 44	43.6	...	...		6	38.40	- 3.96
7 11	42.4	...	...		7	37.62	.....
7 35	40.7	...	...		8	38.43	.....
7 47	39.9	42.6	29.788		9	38.06	.....
8 2	39.9	...	...		10	37.30	.....
8 18	39.6	...	...		11	38.84	.....
8 29	39.3	...	...		12	36.72	.....
8 54	38.9	41.2	29.808		13	36.77	- 0.31
10 5 58	41.3	43.2	29.772	Notes. 1. Upper level out of adjustment. 5. Unsteady. 16. Paint.	14	36.83	.....
6 18	40.9	...	...		15	36.66	+ 2.08
6 28	40.6	...	...		16	36.68	.....
6 52	40.3	42.1	29.748		17	35.78	.....
16 5 56	16.9	...	...		18	35.32	.....
					19	36.80	+14.88
					20	37.36	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	δ Ursæ Minoris S. P.	E	...	6 4 50.0	1 51.7	48.95	51.15	...	305 32 55.65	+ 1.61	- 0.38	- 1 23.58	+86 36 40.03
		W	...	6 9 4.0	6 5.7	51.00	51.90	...	54 26 9.72	+ 2.46	+ 4.12	+ 1 23.62	
2	χ Draconis S. P.	W	...	6 20 2.0	2 33.8	49.65	51.05	...	68 20 27.22	+ 1.71	+ 3.21	+ 2 29.97	+72 41 18.46
		E	...	6 25 51.0	3 15.2	47.90	50.40	...	291 38 46.60	+ 0.96	- 5.18	- 2 30.04	
3	43 Camelop.	E	...	6 40 24.0	2 48.6	50.55	51.40	...	329 55 12.50	+ 2.14	+ 8.62	- 34.74	+69 0 6.62
		W	...	6 45 49.0	2 36.4	51.15	51.35	...	30 3 58.80	+ 2.31	- 7.42	+ 34.75	
4	h Geminorum	W	...	6 57	...	49.30	50.55	26.240	350 33 19.32	+ 0.69	- 0.19	- 9.97	+29 29 46.09
		E	...	...	...	49.05	50.45	26.240	9 24 0.22	+ 0.61	+ 0.19	+ 9.97	
5	25 H. Camelop.	E	...	7 8 10.0	2 39.3	50.30	51.15	...	316 19 48.70	+ 1.99	+ 2.00	- 57.35	+82 35 57.98
		W	...	7 13 6.0	2 16.7	51.00	50.65	...	43 39 20.20	+ 1.89	- 1.48	+ 57.37	
6	ρ Geminorum	W	...	7 23	...	48.60	50.25	25.230	353 2 37.45	+ 0.33	- 0.21	- 7.33	+31 58 24.96
		E	...	...	...	48.75	50.45	25.230	6 56 5.55	+ 0.54	+ 0.21	+ 7.33	
7	24 Lyncis	E	...	7 31 55.0	2 49.3	50.20	50.85	...	339 58 48.30	+ 1.76	+18.33	- 21.90	+58 56 7.86
		W	...	7 37 31.0	2 46.7	50.00	50.60	...	20 0 23.18	+ 1.56	-17.77	+ 21.91	
8	9 Puppis	W	...	7 45 0.0	2 10.1	48.10	49.80	...	307 26 33.45	+ 0.70	+ 8.79	- 18.42	-13 38 55.96
		E	...	7 51 35.0	4 24.9	49.85	50.55	...	52 33 6.18	+ 1.55	-36.43	+ 18.45	
9	4 B. Ursæ Minoris	E	...	7 58 24.0	4 22.4	50.15	50.75	...	310 0 39.10	+ 1.60	+ 0.72	- 11.62	+88 55 23.66
		W	...	8 4 18.0	1 31.6	49.40	50.25	...	49 58 31.08	+ 1.26	- 0.09	+ 11.63	
10	d^1 Cancri	W	...	8 15 1.0	2 41.7	46.95	49.25	...	339 42 27.52	+ 0.14	+30.32	- 22.27	+18 38 15.06
		E	...	8 20 17.5	2 34.8	48.50	50.20	...	20 16 43.40	+ 1.01	-27.79	+ 22.28	
11	181 B. Camelop.	E	...	8 25 58.0	2 57.2	49.60	50.40	...	324 57 29.35	+ 1.42	+ 6.41	- 42.26	+73 57 58.79
		W	...	8 31 28.0	2 32.8	48.95	50.05	...	35 1 40.58	+ 1.10	- 4.77	+ 42.27	
12	ϵ Cancri	W	...	8 41	...	47.65	49.70	25.520	350 10 35.58	- 0.10	- 0.18	- 10.43	+29 6 31.74
		E	...	...	...	48.75	50.05	25.520	9 47 43.68	+ 0.32	+ 0.18	+ 10.43	
13	ρ Ursæ Majoris	E	...	8 51 13.0	2 32.7	49.80	50.30	...	330 55 4.10	+ 1.40	+ 7.62	- 33.54	+68 0 14.20
		W	...	8 56 33.0	2 47.3	48.55	50.00	...	29 4 9.38	+ 0.89	- 9.15	+ 33.54	
14	36 Lyncis	W	...	9 8	...	47.55	49.55	25.780	4 40 22.60	- 0.29	- 0.32	+ 4.95	+43 36 43.02
		E	...	...	...	48.50	50.05	25.780	355 17 37.30	+ 0.25	+ 0.32	- 4.95	
15	h Mali	E	...	9 14 20.0	2 45.5	49.10	50.20	...	64 26 40.70	+ 1.16	-11.62	+ 5.67	-25 33 43.52
		W	...	9 19 51.0	2 45.5	48.50	50.05	...	295 32 28.68	+ 0.92	+11.62	- 5.68	
16	10 Leonis	W	...	9 20 7.0	2 52.4	46.00	49.10	...	328 20 18.25	- 0.18	+23.84	- 37.20	+ 7 15 44.24
		E	...	9 34 34.0	2 34.6	48.50	50.00	...	31 38 50.60	+ 0.91	-19.17	+ 37.20	
17	μ Herculis	E	...	17 39 42.5	2 49.2	48.40	50.25	...	11 9 6.68	+ 0.79	-55.56	+ 12.11	+27 46 27.90
		W	...	17 45 13.0	2 41.3	50.40	50.80	...	348 50 6.52	+ 1.60	+50.50	- 12.11	
18	δ Ursæ Minoris	W	...	17 55 0.0	7 58.5	48.90	50.40	...	47 39 57.02	+ 1.02	- 7.76	+ 7.33	+86 36 37.80
		E	...	17 59 38.0	3 20.5	47.25	49.55	...	312 19 21.15	+ 0.16	+ 1.36	- 7.33	
19	δ Ursæ Minoris	E	...	18 4 8.0	1 9.5	47.80	49.70	...	312 19 21.70	+ 0.37	+ 0.16	- 7.31	+86 36 37.86
		W	...	18 8 56.0	5 57.5	51.30	51.20	...	47 39 52.32	+ 2.01	- 4.34	+ 7.33	
20	March 18, L. Ursæ Minoris S. P.	E	...	6 0 40.0	2 19.1	50.80	52.00	...	395 32 50.15	+ 4.10	0.60	- 20.58	+86 36 39.83
		W	...	6 6 28.0	3 28.9	50.80	48.65	...	54 26 17.05	+ 0.16	+ 1.35	+ 20.63	

Time.	Ther- (32°)	At- ther	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>				
16 6 19	16.6	38.0	30.056	4, 6, 12, 14. Instrument in meridian, observation at IX with movable thread	1	159 69 16.61	
6 26	16.0	...	...		2	17 22	
6 44	15.8	37.2	30.066		3	18 48	- 4.75
7 11	14.7	...	...		4	19 16	+ 7.50
7 16	15.0	...	...		5	19 66	
7 48	14.8	...	...		6	17.62	
8 1	14.5	...	...		7	17.68	
8 18	14.1	17.0	10.092		8	17.14	
8 29	11.9	...	...		9	16.88	
8 54	11.9	...	...		10	17.11	
9 17	11.7	...	...		11	17.05	- 1.93
9 18	11.6	14.1	10.106		12	17.22	
10 43	27.0	28.9	10.186	8 Clouds	13	17.12	+ 0.48
10 3	27.2	...	...	9 26. Very faint	14	17.82	+ 6.60
10 16	27.4	...	...	10 E. One microscope reading decreased 10".	15	15.72	
10 27	28.6	29.0	10.218		16	17.12	+ 15.18
10 6 4	48.6	50.8	29.210		17	15.26	
					18	16.48	
					19	16.12	
					20	16.68	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	χ Draconis S. P.	E	...	6 19 56.0	2 40.0	54.55	50.45	.....	291 38 37.42	+ 2.01	- 3.48	-2 24.72	+72 41 18.99
	March 22, L.	W	...	6 25 20.0	2 44.0	54.45	49.35	.....	68 20 30.00	+ 1.43	+ 3.65	+2 24.81	
2	64 Aurigæ	E	...	7 11 .....	.....	52.35	49.80	26.620	357 50 29.80	+ 3.33	+ 0.29	- 2.15	+41 3 10.63
		W	...	.....	.....	50.90	49.25	26.620	2 6 14.65	+ 2.69	- 0.29	+ 2.15	
3	6 Canis Minoris	W	...	7 21 25.0	2 52.6	49.30	48.50	.....	333 16 27.08	+ 1.19	+ 27.49	- 29.09	+12 12 5.51
		E	...	7 27 11.0	2 53.4	51.50	49.25	.....	26 42 45.50	+ 2.13	- 27.73	+ 29.09	
4	26 Monocerotis	E	...	7 33 52.0	2 38.0	52.95	49.60	.....	48 13 56.95	+ 2.67	- 14.01	+1 4.71	- 9 19 57.61
		W	...	7 39 12.0	2 42.0	51.40	49.15	.....	311 45 9.70	+ 2.05	+ 14.73	-1 4.71	
5	166 B. Camelop.	W	...	7 45 58.0	2 36.8	49.85	48.50	.....	35 14 16.95	+ 1.33	- 4.93	+ 40.82	+74 10 33.47
		E	...	7 51 44.0	3 9.2	51.45	49.50	.....	324 44 51.95	+ 2.24	+ 7.18	- 40.80	
6	27 Lyncis	E	...	7 58 16.5	2 48.8	52.60	49.70	.....	347 7 31.25	+ 2.62	+ 33.59	- 13.20	+51 46 59.95
		W	...	8 3 4.0	1 58.7	50.40	48.90	.....	12 51 22.52	+ 1.67	- 16.62	+ 13.20	
7	χ Cancri	W	...	8 11 12.5	2 52.2	48.85	48.45	.....	348 35 9.70	+ 1.06	+ 56.44	- 11.67	+27 31 34.85
		E	...	8 16 22.5	2 17.8	52.30	49.70	.....	11 23 41.10	+ 2.55	- 36.16	+ 11.67	
8	δ · Hydræ	E	...	8 29 47.0	2 38.2	53.95	50.40	.....	32 52 28.60	+ 3.29	- 19.45	+ 37.39	+ 6 2 4.19
		W	...	8 37 40.0	5 14.8	49.90	48.70	.....	327 5 43.78	+ 1.45	+1 17.02	- 37.38	
9	ζ Hydræ	W	...	8 47 17.0	2 53.0	53.00	49.70	.....	327 22 55.68	+ 2.72	+ 23.42	- 37.00	+ 6 18 24.45
		E	...	8 52 41.5	2 31.5	47.65	48.00	.....	32 36 9.70	+ 0.53	- 17.96	+ 37.00	
10	36 Lyncis	E	...	9 8 .....	.....	48.50	48.50	27.485	355 16 26.95	+ 1.73	+ 0.32	- 4.74	+43 36 42.37
		W	...	.....	.....	54.15	50.70	27.485	4 39 7.00	+ 4.24	- 0.32	+ 4.74	
11	α Hydræ	W	...	9 19 52.0	2 51.1	50.55	49.00	.....	312 50 13.45	+ 1.77	+ 16.76	-1 2.20	- 8 14 50.32
	March 23, L.	E	...	9 25 19.0	2 35.9	46.70	47.60	.....	47 8 55.40	+ 0.11	- 13.92	+1 2.17	
12	a Mali	E	...	8 37 14.0	2 21.1	52.30	53.00	.....	71 42 53.50	+ 0.09	- 7.47	+2 55.44	-32 50 48.15
		W	...	8 42 19.0	2 43.9	57.50	54.90	.....	288 16 15.02	+ 2.37	+ 10.08	-2 55.55	
13	ν ¹ Draconis	E	...	17 27 25.0	2 42.1	52.15	52.55	.....	343 40 1.52	+ 0.40	+ 22.61	- 17.56	+55 14 46.42
		W	...	17 33 17.5	3 10.4	56.80	53.80	.....	16 19 17.95	+ 2.14	- 31.18	+ 17.56	
14	μ Herculis	W	...	17 39 44.5	2 47.6	55.00	53.35	.....	348 50 5.20	+ 1.50	+ 54.52	- 11.82	+27 46 28.33
		E	...	17 44 45.5	2 13.4	52.00	52.40	.....	11 8 48.58	+ 0.23	- 34.55	+ 11.82	
15	δ Ursæ Minoris	E	...	17 55 8.0	7 53.3	52.10	52.40	.....	312 19 13.62	+ 0.27	+ 7.60	-1 5.75	+86 36 37.53
		W	...	18 0 28.0	2 33.3	58.65	55.25	.....	47 39 49.20	+ 3.35	- 0.80	+1 5.72	
16	δ Ursæ Minoris	W	...	18 4 34.0	1 32.7	58.20	55.00	.....	47 39 49.48	+ 3.12	- 0.29	+1 5.74	+86 36 37.79
		E	...	18 9 22.0	6 20.7	52.10	52.55	.....	312 19 16.30	+ 0.35	+ 4.92	-1 5.77	
17	χ Draconis	E	...	18 20 3.0	2 33.6	52.15	52.55	.....	326 14 11.88	+ 0.33	+ 5.36	- 40.07	+72 41 17.37
	March 24, L.	W	...	18 25 26.0	2 49.4	59.35	55.50	.....	33 45 1.72	+ 3.62	- 6.52	+ 40.07	
18	ξ Geminorum	W	...	6 36 50.0	2 54.2	54.60	52.75	.....	334 4 5.30	+ 0.25	+ 28.69	- 28.14	+12 59 45.27
		E	...	6 42 26.5	2 42.3	57.65	53.90	.....	25 55 4.12	+ 1.53	- 24.91	+ 28.16	
19	h Geminorum	E	...	6 57 .....	.....	57.60	53.80	27.745	9 22 55.58	+ 2.19	+ 0.19	+ 9.62	+29 29 47.45
		W	...	.....	.....	57.55	53.55	27.745	350 32 16.92	+ 2.03	- 0.19	- 9.63	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
18 6 23	47.5	50.1	29.724	2, 10, 19. Instrument in meridian, observation at I with movable thread.					1	359 59 35.56	.....
22 7 11	48.2	.....	29.724						2	37.08	+ 3.90
7 24	48.5	49.9	29.744						3	37.83	+13.99
7 37	47.9	.....	.....						4	37.04	.....
7 49	48.6	.....	.....						5	37.38	.....
8 4	48.6	49.9	29.744						6	37.50	.....
8 25	48.1	.....	.....						7	37.34	+ 9.41
8 32	47.9	.....	.....						8	37.35	.....
8 50	47.9	49.4	29.718						9	37.04	.....
9 24	48.7	49.6	29.726						10	37.72	+ 5.09
23 8 40	48.6	.....	.....						11	36.77	.....
8 58	.....	49.6	30.142						12	36.74	.....
17 31	39.0	41.0	30.234						13	36.72	+11.58
17 43	38.9	.....	.....						14	37.74	.....
17 58	39.2	.....	.....						15	36.60	.....
18 8	39.1	.....	.....						16	36.92	.....
18 23	39.1	40.8	30.268						17	38.20	.....
24 6 40	55.7	57.0	30.256						18	37.50	.....
7 1	54.9	.....	.....						19	36.74	+ 7.55

Notes.
7, 11, 12, 18. Clouds.
8. Very faint; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	64 Aurigæ	W	...	7 11 .....	...	56.00	53.45	26.410	2 6 25.20	+ 0.14	- 0.29	+ 2.16	+41 3 11.51
		E	...	...	...	57.05	53.55	26.410	357 50 38.92	+ 0.48	+ 0.29	- 2.16	
2	6 Canis Minoris	E	...	7 21 23.5	2 54.0	57.30	53.70	.....	26 42 43.92	+ 1.32	-27.93	+ 29.24	+12 12 6.07
	March 25, L.	W	...	7 26 42.5	2 25.0	57.05	54.00	.....	333 16 33.05	+ 1.56	+19.40	- 29.25	
3	8 Draconis S. P.	W	...	7 9 59.0	2 22.2	53.90	52.30	.....	73 31 45.55	+ 2.44	+ 3.42	+3 7.35	+67 29 22.29
		E	...	7 15 20.0	2 58.8	51.00	50.00	.....	286 27 28.92	+ 0.56	- 5.42	-3 7.37	
4	u Geminorum	E	...	7 27 6.5	2 44.5	49.45	50.15	.....	11 49 5.05	+ 0.24	-49.00	+ 11.75	+27 6 25.81
		W	...	7 32 31.8	2 40.8	50.15	53.00	.....	348 10 6.12	+ 3.37	+47.68	- 11.75	
5	53 Camelop.	E	...	7 50 32.0	2 49.8	50.55	50.30	.....	338 19 44.85	+ 0.60	+16.27	- 22.31	+60 35 15.04
		W	...	7 56 5.0	2 43.2	57.70	53.35	.....	21 39 24.98	+ 3.90	-15.03	+ 22.30	
6	ζ Cancri	W	...	8 3 43.0	2 50.1	56.50	52.65	.....	339 0 9.50	+ 3.28	+32.61	- 21.55	+17 56 2.03
		E	...	8 9 30.5	3 3.4	51.60	50.35	.....	20 59 8.62	+ 0.87	-37.91	+ 21.55	
7	30 Monocerotis	E	...	8 18 12.0	2 30.6	51.65	50.60	.....	42 30 10.98	+ 0.97	-14.21	+ 51.40	- 3 35 54.53
		W	...	8 23 10.0	2 27.4	57.60	53.05	.....	317 27 32.82	+ 3.72	+13.61	- 51.38	
8	δ Hydræ	W	...	8 29 36.5	2 48.7	55.15	52.10	.....	327 6 35.78	+ 2.60	+22.12	- 36.26	+ 6 2 2.23
		E	...	8 34 34.0	2 8.8	51.20	50.60	.....	32 52 28.88	+ 0.87	-12.89	+ 36.26	
9	14 Hydræ	E	...	8 41 31.0	2 52.1	52.50	51.15	.....	41 59 51.32	+ 1.53	-18.75	+ 50.48	- 3 5 30.69
		W	...	8 47 7.5	2 44.4	56.30	52.70	.....	317 59 20.00	+ 3.23	+17.11	- 50.49	
10	44 B. Ursæ Majoris	W	...	8 53 57.0	2 52.9	54.90	52.10	.....	15 44 13.00	+ 2.52	-27.04	+ 15.82	+54 39 43.59
		E	...	8 59 28.0	2 38.1	51.30	50.75	.....	344 15 2.68	+ 0.90	+22.62	- 15.82	
11	h Mali	W	...	9 14 27.0	2 38.6	54.95	52.05	.....	295 32 18.82	+ 2.52	+10.67	-1 56.98	-25 33 46.51
		E	...	9 19 20.0	2 14.4	52.55	51.10	.....	64 26 50.58	+ 1.46	- 7.66	+1 57.01	
12	10 Leonis	E	...	9 29 9.5	2 49.1	53.80	51.55	.....	31 38 56.78	+ 2.01	-22.94	+ 34.63	+ 7 15 43.65
		W	...	9 34 27.0	2 28.4	57.80	53.05	.....	328 20 17.68	+ 3.72	+17.66	- 34.63	
13	6 Sextantis	W	...	9 43 18.0	2 56.9	55.65	52.30	.....	317 16 56.58	+ 2.84	+19.53	- 51.82	- 3 47 54.41
		E	...	9 48 43.0	2 28.1	53.00	51.40	.....	42 42 9.45	+ 1.70	-13.69	+ 51.82	
14	μ Ursæ Majoris	W	...	10 17 .....	...	53.90	51.65	26.005	3 2 20.30	+ 1.33	- 0.30	+ 3.00	+41 58 49.85
	March 28, L.	E	...	...	...	52.35	51.05	26.005	356 55 20.00	+ 0.68	+ 0.30	- 3.00	
15	δ Ursæ Minoris	W	...	17 57 22.0	5 41.0	48.20	51.95	.....	47 39 52.78	+ 3.30	- 3.94	+1 6.99	+86 36 38.54
		E	...	18 2 31.0	0 32.0	41.90	49.20	.....	312 19 22.05	+ 0.34	+ 0.03	-1 7.02	
16	δ Ursæ Minoris	E	...	18 7 34.0	4 31.0	41.80	49.20	.....	312 19 19.95	+ 0.32	+ 2.49	-1 7.08	+86 36 38.21
		W	...	18 12 44.0	9 41.0	48.40	51.95	.....	47 39 59.72	+ 3.35	-11.46	+1 7.13	
17	ζ Draconis	W	...	18 20 10.0	2 27.0	47.60	51.85	.....	33 45 0.12	+ 3.09	- 4.91	+ 40.92	+72 41 17.00
	March 29, L.	E	...	18 24 14.0	1 37.0	41.35	49.10	.....	326 14 17.22	+ 0.14	+ 2.14	- 40.92	
18	δ Draconis S. P.	E	...	7 9 43.0	2 38.5	52.55	49.95	.....	286 27 35.20	+ 3.00	- 4.26	-3 18.20	+67 29 22.54
		W	...	7 14 58.0	2 36.5	49.45	48.70	.....	73 31 33.30	+ 1.60	+ 4.15	+3 18.26	
19	β Canis Minoris	W	...	7 20 10.0	1 28.0	49.10	48.50	.....	329 33 34.60	+ 1.41	+ 6.41	- 34.87	+ 8 28 44.96
		E	...	7 24 16.0	2 29.0	54.00	50.00	.....	30 25 51.10	+ 3.40	-18.39	+ 34.87	

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
24 7 24	54.0	55.3	10.250	1. 14. Instrument in meridian, observation at IX with movable thread	1	359 59 36.23	+ 3.81
24 7 11	64.1	66.2	29.866	7 W. Instrument in meridian, observation assumed as with movable thread at 27.000 rev.	2	35.06	+13.88
7 10	64.8	...	...		3	37.72	
7 54	64.6	...	...		4	36.28	+ 8.81
8 7	64.6	...	...		5	37.78	
8 21	64.9	66.0	29.860		6	38.48	
8 12	65.0	...	...		7	37.94	
8 52	64.6	...	...		8	38.68	
8 57	64.7	66.0	29.842		9	37.22	
9 18	63.7	...	...		10	37.38	+ 2.04
9 33	63.7	65.2	29.816		11	38.21	
9 47	63.8	...	...		12	37.46	+15.18
10 14	64.6	65.2	29.824		13	38.20	
28 18 1	26.7	...	...		14	38.48	
18 17	35.8	...	...		15	37.26	
18 26	35.7	...	...		16	37.21	
18 37	...	27.1	10.016		17	38.60	
29 7 11	41.0	41.0	10.038		18	36.52	
7 28	40.0	...	...		19	39.26	

Notes.

1. Diffuse.
2, 5. Clouds; very faint.
3-14. Clouds.
6. Mean of the close double.
17 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	26 Monocerotis	W E	...	7 33 32.0 7 38 47.0	2 58.0 2 17.0	49.35 53.90	48.45 49.95	..... .....	311 45 13.10 48 13 52.42	+ 1.46 + 3.35	+17.78 -10.53	-1 6.50 +1 6.53	- 9 19 56.28
2	ε Draconis s. p.	E W	...	7 45 36.0 7 51 38.0	2 43.2 3 18.8	53.40 50.00	49.95 48.55	..... .....	288 59 2.28 71 0 7.60	+ 3.20 + 1.65	- 4.08 + 6.06	-2 51.28 +2 51.32	+70 1 15.06
3	ψ Cancri	W E	...	8 1 40.0 8 6 16.0	2 50.9 1 45.1	47.85 53.40	47.65 50.05	..... .....	346 51 33.02 13 7 8.22	+ 0.68 + 3.26	+49.11 -18.58	- 13.90 + 13.89	+25 47 47.74
4	31 Lyncis	E W	...	8 16 ..... .....	..... .....	53.95 48.70	50.30 48.00	27.900 27.900	355 23 6.85 4 31 52.85	+ 4.26 + 1.81	+ 0.32 - 0.32	- 4.77 + 4.77	+43 29 42.90
5	27 B. Ursæ Majoris	W E	...	8 29 7.0 8 34 37.0	2 55.0 2 35.0	46.75 51.80	47.90 49.80	..... .....	14 7 28.20 345 51 48.00	+ 0.53 + 2.75	-32.00 +25.11	+ 15.01 - 15.02	+53 2 52.13
6	14 Hydræ	W E	...	8 41 40.5 8 46 48.0	2 42.6 2 24.9	46.50 51.70	47.50 50.00	..... .....	317 59 28.75 41 59 40.65	+ 0.27 + 2.82	+16.74 -13.29	- 53.67 + 53.68	- 3 5 29.20
7	44 B. Ursæ Majoris	E W	...	8 53 59.0 8 59 19.0	2 50.8 2 29.2	53.45 48.20	50.35 48.20	..... .....	344 14 58.55 15 44 8.40	+ 3.41 + 1.02	+26.39 -20.14	- 16.83 + 16.83	+54 39 43.98
8	θ Hydræ	W E	...	9 6 23.5 9 12 6.0	2 49.6 2 52.9	46.55 52.95	47.55 50.15	..... .....	323 47 38.38 36 11 35.82	+ 0.31 + 3.20	+20.64 -21.45	- 43.69 + 43.70	+ 2 42 53.86
9	28 Hydræ	E W	...	9 17 39.0 9 22 43.0	2 47.9 2 16.1	53.65 49.05	50.30 48.35	..... .....	43 36 40.42 316 22 36.22	+ 3.44 + 1.32	-17.28 +11.35	+ 56.90 - 56.91	- 4 42 29.07
10	ι Hydræ	W E	...	9 32 6.0 9 37 25.0	2 42.2 2 36.8	46.55 52.80	47.30 50.15	..... .....	320 22 12.50 39 36 59.10	+ 0.19 + 3.15	+17.50 -16.36	- 49.52 + 49.53	- 0 42 40.70
11	6 Sextantis	E W	...	9 43 56.0 9 48 47.0	2 18.8 2 32.2	53.80 49.05	50.50 48.55	..... .....	42 42 0.78 317 17 6.22	+ 3.60 + 1.43	-12.03 +14.46	+ 55.20 - 55.18	- 3 47 53.63
12	ν ² Hydræ	W E	...	9 57 55.0 10 3 3.0	2 23.1 2 44.9	46.90 53.05	47.90 50.25	..... .....	308 29 10.08 51 30 5.08	+ 0.56 + 3.25	+10.83 -14.38	-1 15.13 +1 15.14	-12 36 14.70
13	μ Ursæ Majoris	E W	...	10 17 ..... .....	..... .....	54.05 48.00	50.15 48.05	27.230 27.230	356 54 23.68 3 1 30.15	+ 4.19 + 1.65	+ 0.30 - 0.30	- 3.20 + 3.20	+41 58 51.54
14	37 Ursæ Majoris	W E	...	10 25 59.0 10 31 16.0	2 51.4 2 25.6	46.75 52.30	47.75 49.85	..... .....	18 38 53.55 341 20 22.12	+ 0.45 + 2.88	-20.89 +15.08	+ 20.23 - 20.23	+57 34 33.42
15	April 1, L. 60 Cancri	W E	...	8 47 59.0 8 53 23.5	2 32.9 2 51.6	49.20 56.55	52.30 55.55	..... .....	333 3 50.20 26 55 27.80	+ 1.26 + 4.71	+21.42 -26.98	- 28.52 + 28.52	+11 59 21.84
16	θ Hydræ	E W	...	9 6 48.0 9 11 31.0	2 25.1 2 17.9	55.50 54.50	55.45 55.50	..... .....	36 11 31.72 323 47 37.02	+ 4.39 + 4.17	-15.11 +13.65	+ 41.09 - 41.08	+ 2 42 52.52
17	28 Hydræ	W E	...	9 17 38.0 9 23 23.0	2 49.0 2 56.0	52.25 55.25	58.50 63.50	..... .....	316 22 24.05 43 36 47.52	+ 1.63 + 3.13	+17.51 -18.99	- 53.42 + 53.35	- 4 42 30.94
18	ι Hydræ	E W	...	9 31 59.0 9 37 17.0	2 49.3 2 28.7	54.95 54.40	51.90 51.65	..... .....	39 37 4.00 320 22 8.42	+ 2.47 + 2.24	-19.07 +14.71	+ 46.22 - 46.16	- 0 42 40.52
19	23 Leonis	W E	...	9 42 51.5 9 48 4.0	2 49.9 2 22.6	52.45 55.05	51.10 52.00	..... .....	334 35 0.80 25 24 4.18	+ 1.44 + 2.57	+27.76 -19.56	- 26.48 + 26.47	+13 30 41.61
20	ν ² Hydræ	E W	...	9 57 30.0 10 2 40.0	2 48.2 2 21.8	56.85 54.15	52.45 51.45	..... .....	51 30 9.88 308 29 3.38	+ 3.19 + 2.05	-14.97 +10.64	+1 10.00 -1 9.98	-12 36 14.32

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
29 7 37	39.9	.....	.....	4. 13. Instrument in meridian, observation at I with movable thread.						1	359 59 38.80	.....
7 50	39.7	.....	.....							2	38.38	.....
8 5	39.2	41.3	30.064							3	37.85	+ 9.35
8 33	38.7	.....	.....							4	37.60	.....
8 45	38.6	.....	.....							5	36.20	+ 1.17
9 10	38.1	39.9	30.076							6	37.98	.....
9 21	37.8	.....	.....							7	38.82	+ 1.31
9 36	37.1	.....	.....							8	38.46	.....
9 47	37.4	38.9	30.084							9	37.73	+18.15
10 1	37.4	.....	.....							10	38.04	+16.92
10 30	37.0	38.9	30.092							11	37.24	.....
1 8 51	61.7	62.3	29.686							12	37.72	.....
9 10	61.6	.....	.....							13	37.18	.....
9 21	62.5	.....	.....							14	36.60	+ 3.21
9 35	65.0	65.0	29.694							15	39.20	+13.85
9 46	65.5	.....	.....							16	37.92	.....
10 1	65.6	.....	.....							17	37.39	+18.20
										18	36.42	+16.90
										19	38.59	+13.10
										20	37.10	.....

Notes

15. Diffuse.

16. 17. Unsteady and diffuse.

18. 20. Very unsteady.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	42 Leonis	W E	...	10 13 40.5 10 18 54.5	2 51.2 2 22.8	50.40 54.50	50.35 52.05	.....	336 31 36.40 23 27 25.65	+ 0.58 + 2.44	+30.10 -20.95	- 24.18 + 24.18	+15 27 22.47
2	37 Ursæ Majoris	E W	...	10 26 2.5 10 31 12.0	2 48.0 2 21.5	55.55 52.75	52.10 51.35	.....	341 20 14.60 18 38 49.18	+ 2.68 + 1.64	+20.08 -14.24	- 18.82 + 18.83	+57 34 35.12
3	37 Sextantis	W E	...	10 38 7.0 10 43 14.0	2 50.0 2 17.0	52.80 55.75	51.35 52.55	.....	327 57 2.22 32 2 1.35	+ 1.66 + 3.02	+22.95 -14.90	- 34.93 + 34.95	+ 6 52 30.42
4	April 2, L. β Canis Minoris	E W	...	7 19 6.0 7 24 22.5	2 41.1 2 35.4	42.40 45.80	48.85 49.50	.....	30 25 55.78 329 33 13.45	+ 1.10 + 2.24	-21.50 +20.00	+ 33.35 - 33.36	+ 8 28 43.49
5	α Draconis S. P.	W E	...	7 45 43.0 7 50 26.0	2 36.5 2 6.5	48.20 43.75	48.90 47.40	.....	71 0 14.42 288 58 53.78	+ 2.50 + 0.66	+ 3.76 - 2.45	+2 43.89 -2 43.98	+70 1 15.03
6	31 Lyncis	W E	...	8 16 ..... .....	..... .....	50.50 45.05	49.75 47.75	26.115 26.115	4 33 3.80 355 24 21.05	+ 2.95 + 0.57	- 0.21 + 0.21	+ 4.57 - 4.57	+43 29 43.61
7	η Cancri	E W	...	8 24 7.0 8 29 16.0	2 53.2 2 15.8	43.05 49.95	47.45 49.95	.....	18 9 16.88 341 50 1.98	+ 0.54 + 3.52	-38.19 +23.47	+ 18.74 - 18.75	+20 45 52.81
8	α Mali	W E	...	8 36 50.0 8 41 38.0	2 45.0 2 3.0	48.30 43.40	40.10 47.75	.....	288 16 6.80 71 42 55.70	+ 2.69 + 0.76	+10.22 - 5.68	-2 51.38 +2 51.45	-32 50 50.26
9	60 Cancri	E W	...	8 47 45.0 8 52 29.0	2 46.9 1 57.1	51.50 56.70	48.10 49.85	.....	26 55 26.12 333 3 54.50	+ 2.96 + 5.15	-25.52 +12.57	+ 29.07 - 29.07	+11 59 21.95
10	April 4, L. β Pyxidis	E W	...	8 33 33.0 8 38 45.0	2 38.4 2 33.6	56.50 56.65	49.00 48.85	.....	73 50 5.50 286 8 59.98	+ 2.12 + 2.12	- 9.08 + 8.54	+3 21.14 -3 21.17	-34 58 28.41
11	σ ² Cancri (mean)	W E	...	8 48 ..... .....	..... .....	55.15 55.00	48.55 48.00	25.640 25.640	352 0 22.98 7 57 41.00	+ 0.85 + 0.59	- 0.20 + 0.20	- 8.28 + 8.28	+30 56 29.33
12	ε Cancri	E W	...	9 0 57.0 9 6 25.0	2 44.2 2 43.8	55.70 56.10	48.15 48.30	.....	16 29 15.75 343 29 49.40	+ 1.56 + 1.75	-37.25 +37.06	+ 17.50 - 17.51	+22 25 53.26
13	40 Lyncis	W E	...	9 15 ..... .....	..... .....	53.80 53.95	47.65 47.80	26.435 26.435	355 51 7.78 4 5 54.58	+ 0.10 + 0.24	- 0.23 + 0.23	- 4.26 + 4.26	+34 47 48.73
14	ε Leonis	E W	...	9 23 49.0 9 28 32.5	2 48.2 1 55.3	55.25 55.30	48.50 48.15	.....	27 11 28.00 332 47 52.70	+ 1.63 + 1.48	-25.72 +12.09	+ 30.37 - 30.37	+11 43 17.50
15	o Leonis	W E	...	9 33 4.0 9 38 13.5	2 48.5 2 21.0	53.45 53.50	47.50 48.40	.....	331 23 59.35 28 35 5.48	+ 0.70 + 1.12	+24.76 -17.34	- 32.22 + 32.23	+10 19 32.24
16	23 Leonis	E W	...	9 42 56.0 9 48 13.0	2 45.3 2 31.7	54.75 54.40	48.15 47.90	.....	25 24 6.72 334 35 5.20	+ 1.26 + 1.10	-26.28 +22.13	+ 28.11 - 28.10	+13 30 41.95
17	λ Hydræ	W E	...	10 3 25.0 10 8 13.0	2 20.6 2 27.4	52.40 52.70	47.45 48.00	.....	309 12 16.95 50 46 55.60	+ 0.32 + 0.71	+10.59 -11.64	-1 12.41 +1 12.43	-11 53 4.13
18	42 Leonis	E W	...	10 13 50.0 10 18 38.5	2 41.6 2 6.9	54.15 54.90	48.10 48.00	.....	23 27 28.12 336 31 48.75	+ 1.15 + 1.30	-26.82 +16.54	+ 25.70 - 25.70	+15 27 23.06
19	44 Hydræ	W E	...	10 26 43.0 10 31 42.0	2 35.2 2 23.8	52.80 52.90	47.30 47.75	.....	297 50 38.90 62 8 30.15	+ 0.38 + 0.62	+10.62 - 9.12	-1 51.65 +1 51.65	-23 15 20.83
20	37 Sextantis	E W	...	10 38 9.5 10 43 18.5	2 47.4 2 21.6	54.00 54.35	48.10 47.90	.....	32 2 5.40 327 57 9.60	+ 1.05 + 1.08	-22.25 +15.92	+ 37.06 - 37.06	+ 6 52 30.83

Time	Ther. 682.	Att. ther	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point	Red. to 1904.0.
<i>d h m</i>			<i>in</i>							
1 19 16	65.9			Instrument in meridian, observation at VII with movable thread				1	359 59 37.11	+12.35
10 29	65.4			Instrument in meridian, observation at IX with movable thread.				2	36.08	+ 2.45
10 41	64.6	66.1	29.700					3	38.16	.....
7 22	66.2	68.8	29.693					4	35.53	.....
7 49	64.9							5	36.29	.....
8 5	64.2							6	36.00	.....
8 27	63.7	66.2	29.716					7	34.10	.....
8 44	62.9							8	35.28	.....
8 51	62.9							9	37.89	+13.81
9 27	49.5	63.2	29.716					10	34.68	+26.18
9 17	44.9	47.5	16.162					11	35.14	.....
8 53	44.8							12	34.13	+16.47
9 4	44.2							13	36.23	.....
9 27	44.2							14	35.09	.....
9 16	44.6							15	37.04	.....
10 5	44.8	45.1	16.146					16	35.07	+13.02
10 15	44.2							17	36.28	.....
10 19	43.2							18	34.52	+12.21
10 41	43.2	44.5	16.142					19	35.28	+19.55
								20	35.40	.....

Notes
8.9 Diffuse and unsteady
19 Unsteady

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	χ Leonis	W	...	10 57 13.5	2 41.6	52.20	47.35	.....	328 55 38.78	+ 0.30	+21.27	- 35.71	+ 7 51 4.45
		E	...	11 2 22.0	2 26.9	52.75	47.75	.....	31 3 30.35	+ 0.64	-17.58	+ 35.72	
2	φ Leonis	E	...	11 8 55.0	2 43.1	54.15	48.15	.....	42 2 5.35	+ 1.11	-16.83	+ 53.44	- 3 7 51.25
	April 5, L.	W	...	11 14 6.0	2 27.9	54.70	48.00	.....	317 57 5.55	+ 1.22	+13.84	- 53.42	
3	20 Puppis	W	...	8 4 4.0	4 41.7	51.05	46.90	.....	305 34 42.00	+ 1.50	+39.89	-1 19.65	-15 30 16.92
		E	...	8 11 10.0	2 24.3	53.55	47.45	.....	54 23 59.30	+ 2.48	-10.47	+1 19.65	
4	α Ursæ Majoris	E	...	8 19 9.0	2 59.5	54.95	47.80	.....	337 52 32.28	+ 2.90	+17.58	- 23.23	+61 2 23.47
		W	...	8 24 31.0	2 22.5	52.10	46.90	.....	22 6 29.18	+ 1.75	-11.08	+ 23.24	
5	β Pyxidis	W	...	8 33 40.0	2 31.4	50.50	46.05	.....	286 8 55.62	+ 0.95	+ 8.29	-3 15.26	-34 58 28.71
		E	...	8 38 46.0	2 34.6	53.05	47.75	.....	73 50 11.18	+ 2.39	- 8.64	+3 15.48	
6	σ^2 Cancrī (mean)	E	...	8 48 .....	.....	55.80	48.10	27.175	7 56 36.08	+ 4.00	+ 0.20	+ 8.06	+30 56 29.35
		W	...	.....	.....	52.55	46.90	27.175	351 59 19.30	+ 2.63	- 0.20	- 8.06	
7	ξ Cancrī	W	...	9 1 3.0	2 38.2	48.30	45.65	.....	343 29 54.88	+ 0.26	+34.57	- 17.05	+22 25 52.91
		E	...	9 6 10.0	2 28.8	53.10	47.75	.....	16 29 11.28	+ 2.46	-30.58	+ 17.05	
8	83 Cancrī	E	...	9 10 37.5	2 50.7	55.00	48.05	.....	20 48 26.62	+ 3.05	-33.08	+ 21.89	+18 6 34.11
		W	...	9 15 42.0	2 13.8	52.00	46.50	.....	339 10 53.35	+ 1.54	+20.32	- 21.89	
9	h Ursæ Majoris	W	...	9 21 9.0	2 40.3	50.85	46.45	.....	24 32 59.48	+ 1.25	-11.71	+ 26.33	+63 28 55.39
		E	...	9 25 53.0	2 3.7	53.55	47.60	.....	335 26 14.85	+ 2.44	+ 6.98	- 26.33	
10	α Leonis	E	...	9 33 1.5	2 51.0	55.45	47.85	.....	28 35 12.12	+ 3.10	-25.50	+ 31.46	+10 19 32.27
		W	...	9 38 7.5	2 15.0	52.40	46.45	.....	331 24 6.22	+ 1.69	+15.90	- 31.46	
11	μ Leonis	W	...	9 44 20.5	2 48.7	49.50	45.60	.....	347 31 6.40	+ 0.48	+50.07	- 12.78	+26 27 24.44
		E	...	9 49 46.0	2 36.8	53.90	47.95	.....	12 27 56.35	+ 2.80	-43.26	+ 12.78	
12	193 G. Hydræ	E	...	9 57 1.0	2 45.0	56.00	48.15	.....	62 42 44.35	+ 3.35	-11.89	+1 51.59	-23 49 34.37
		W	...	10 3 5.0	3 19.0	52.05	46.50	.....	297 16 18.00	+ 1.52	+17.29	-1 51.54	
13	138 B. Ursæ Majoris	W	...	10 11 27.5	2 42.5	50.25	46.00	.....	15 46 19.52	+ 0.83	-23.81	+ 16.30	+54 41 53.21
		E	...	10 16 38.5	2 28.5	53.00	47.25	.....	344 12 54.05	+ 2.17	+19.89	- 16.30	
14	29 Sextantis	E	...	10 21 34.0	2 53.3	54.15	47.55	.....	41 9 25.60	+ 2.64	-19.34	+ 50.44	- 2 15 6.80
		W	...	10 26 59.0	2 31.7	51.50	46.30	.....	318 49 46.65	+ 1.37	+14.82	- 50.48	
15	35 H. Ursæ Majoris	W	...	10 33 15.0	2 49.0	50.75	46.30	.....	30 38 36.30	+ 1.12	- 8.29	+ 34.24	+69 34 43.05
		E	...	10 39 0.0	2 56.0	53.35	47.45	.....	329 20 33.58	+ 2.34	+ 9.00	- 34.26	
16	54 Leonis	E	...	10 47 27.5	2 48.6	55.10	47.50	.....	13 39 48.68	+ 2.86	-46.16	+ 14.08	+25 15 33.59
		W	...	10 52 45.5	2 29.4	51.90	46.00	.....	346 19 29.78	+ 1.31	+36.25	- 14.08	
17	φ Leonis	W	...	11 9 8.0	2 30.1	50.30	45.95	.....	317 57 7.50	+ 0.86	+14.25	- 52.25	- 3 7 50.57
	April 9, L.	E	...	11 14 17.0	2 38.9	54.30	47.75	.....	42 2 5.90	+ 2.70	-15.97	+ 52.25	
18	3 H. Ursæ Majoris	E	...	8 0 13.0	2 53.5	43.60	48.05	.....	330 9 43.08	+ 0.51	+ 9.30	- 31.85	+68 45 30.34
		W	...	8 6 22.0	3 15.5	46.95	50.00	.....	29 49 25.95	+ 2.31	-11.81	+ 31.86	
19	α Ursæ Majoris	W	...	8 19 10.0	2 58.2	47.05	49.80	.....	22 6 35.35	+ 2.18	-17.33	+ 22.58	+61 2 24.24
		E	...	8 24 43.0	2 34.8	43.25	47.90	.....	337 52 36.92	+ 0.29	+13.08	- 22.58	
20	6 Hydræ	E	...	8 32 49.0	2 30.0	51.00	48.45	.....	51 2 24.30	+ 2.48	-12.00	+1 8.68	-12 8 29.92
		W	...	8 39 58.0	4 39.0	53.20	49.35	.....	308 56 13.85	+ 3.57	+41.50	-1 8.71	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
4 11 1	42.5	...	...	6. Instrument in meridian, observation at I with movable thread.						1	359 59 36.88	
11 12	42.6	44.2	30.140							2	35.13	+14.69
5 87	58.3	60.4	29.998							3	37.35	
8 23	58.0	...	...							4	30.31	
8 37	56.0	...	...							5	35.00	+26.29
9 4	54.2	56.4	29.986							6	36.10	
9 14	54.2	...	...							7	36.44	+10.43
9 25	53.6	...	...							8	35.90	
9 36	52.6	...	...							9	36.64	
9 48	52.4	...	...							10	36.76	
10 0	52.3	...	...							11	36.42	
10 14	53.6	54.3	29.976							12	36.34	+21.25
10 24	52.6	...	...							13	36.32	+ 1.90
10 36	52.1	...	...							14	35.85	
10 50	51.4	...	...							15	37.02	- 0.70
11 13	50.5	53.2	29.968							16	36.36	+ 9.59
9 8 4	61.0	63.2	29.334							17	37.62	+14.74
8 22	61.1	...	...							18	34.68	
8 35	60.6	...	...							19	35.24	
										20	36.84	

Notes.
5. Very faint.
12. Unsteady.
14 W. Clock time increased 1^m.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	83 Cancrī	W	...	9 10 33.0	2 55.1	53.50	49.50	.....	339 10 37.45	+ 3.63	+ 34.80	- 21.17	+18 6 34.14
		E	...	9 15 47.5	2 19.4	50.35	48.00	.....	20 48 18.62	+ 2.09	- 22.06	+ 21.18	
2	<i>h</i> Ursæ Majoris	E	...	9 21 3.0	2 46.1	51.00	48.50	.....	335 26 8.60	+ 2.58	+ 12.58	- 25.46	+63 28 56.83
		W	...	9 26 13.0	2 23.9	54.85	49.95	.....	24 32 58.32	+ 4.22	- 9.44	+ 25.46	
3	κ Hydræ	W	...	9 32 57.0	2 36.0	53.60	49.65	.....	307 11 10.82	+ 3.77	+ 12.58	- 13.37	-13 54 7.58
		E	...	9 38 4.0	2 31.0	50.55	48.40	.....	52 47 58.35	+ 2.41	- 11.79	+ 13.38	
4	μ Leonis	E	...	9 44 14.5	2 54.5	50.80	48.10	.....	12 28 7.35	+ 2.33	- 53.57	+ 12.35	+26 27 25.03
		W	...	9 49 26.2	2 17.2	54.35	49.50	.....	347 31 20.48	+ 3.87	+ 33.12	- 12.35	
5	193 G. Hydræ	W	...	9 57 4.0	2 41.9	53.10	49.40	.....	297 16 17.75	+ 3.56	+ 11.44	- 1 47.86	-23 49 36.44
		E	...	10 2 13.0	2 27.1	50.60	48.45	.....	62 42 50.32	+ 2.40	- 9.45	+ 1 47.89	
6	April 11, L. 3 H. Ursæ Majoris	W	...	8 1 6.0	2 0.4	46.95	49.90	.....	29 49 17.35	+ 2.49	- 4.48	+ 32.61	+68 45 29.79
		E	...	8 5 34.0	2 27.6	43.70	49.40	.....	330 9 46.22	+ 1.46	+ 6.73	- 32.61	
7	6 Hydræ	W	...	8 32 44.0	2 34.9	46.80	49.40	.....	308 56 44.22	+ 2.18	+ 12.80	- 1 10.47	-12 8 29.07
		E	...	8 37 37.0	2 18.1	43.30	48.45	.....	51 2 19.18	+ 0.82	- 10.17	+ 1 10.47	
8	ρ^1 Cancrī	E	...	8 43 51.0	2 52.4	44.55	48.45	.....	10 13 57.65	+ 1.21	- 1 2.27	+ 10.32	+28 41 44.65
		W	...	8 49 10.5	2 27.1	47.00	49.25	.....	349 45 25.58	+ 2.19	+ 45.35	- 10.32	
9	38 Lyncis	W	...	9 13 .....	.....	44.35	48.65	25.340	358 16 26.88	+ 0.45	- 0.25	- 1.71	+37 12 27.10
		E	...	.....	.....	42.45	47.95	25.340	1 42 2.92	- 0.29	+ 0.25	+ 1.71	
10	April 14, L. 73 Draconis s. p.	E	...	8 30 12.0	2 24.5	44.35	47.20	.....	293 34 33.15	+ 0.70	- 2.56	- 2 13.19	+74 37 24.38
		W	...	8 35 6.0	2 29.5	50.05	49.95	.....	66 24 36.42	+ 3.50	+ 2.74	+ 2 13.26	
11	ρ^1 Cancrī	W	...	8 44 7.8	2 35.7	49.25	49.40	.....	349 45 21.82	+ 3.06	+ 50.80	- 10.58	+28 41 44.15
		E	...	8 49 22.5	2 39.0	45.60	47.80	.....	10 13 51.25	+ 1.36	- 52.97	+ 10.59	
12	145 B. Lyncis	E	...	9 0 .....	.....	45.50	47.65	27.295	0 3 5.00	+ 1.97	+ 0.27	+ 0.09	+38 50 7.09
		W	...	.....	.....	51.10	49.85	27.295	359 52 44.00	+ 4.45	- 0.27	- 0.09	
13	38 Lyncis	E	...	9 13 .....	.....	45.55	47.65	27.670	1 40 27.30	+ 1.96	+ 0.25	+ 1.76	+37 12 28.14
		W	...	.....	.....	50.35	49.65	27.670	358 14 51.98	+ 4.16	- 0.25	- 1.76	
14	α Hydræ	E	...	9 19 52.5	2 50.4	45.95	47.50	.....	47 8 54.65	+ 1.26	- 16.63	+ 1 3.34	- 8 14 49.01
		W	...	9 25 13.5	2 30.6	51.05	49.60	.....	312 50 18.02	+ 3.57	+ 12.99	- 1 3.40	
15	κ Hydræ	E	...	9 32 46.0	2 47.0	45.60	47.40	.....	52 47 55.65	+ 1.16	- 14.42	+ 1 17.57	-13 54 6.17
		W	...	9 38 31.0	2 58.0	50.50	49.50	.....	307 11 12.02	+ 3.42	+ 16.38	- 1 17.61	
16	83 B. Leonis	W	...	9 48 20.5	2 50.9	48.20	48.90	.....	330 27 31.22	+ 2.55	+ 24.80	- 33.43	+9 23 5.13
		E	...	9 53 17.5	2 6.1	43.40	47.00	.....	29 31 27.95	+ 0.41	- 13.51	+ 33.44	
17	η Leonis	E	...	9 59 6.5	2 50.2	45.10	47.15	.....	21 41 18.82	+ 0.90	- 31.75	+ 23.50	+17 13 41.02
		W	...	10 4 9.0	2 12.3	51.65	50.00	.....	338 18 0.40	+ 3.98	+ 19.20	- 23.49	
18	138 B. Ursæ Majoris	E	...	10 11 18.0	2 51.8	45.00	47.30	.....	344 12 48.28	+ 0.93	+ 26.61	- 16.68	+54 41 54.57
		W	...	10 16 41.0	2 31.2	50.50	49.50	.....	15 46 15.42	+ 3.38	- 20.62	+ 16.68	
19	54 Leonis	W	...	10 47 30.0	2 46.0	48.00	48.50	.....	346 19 22.55	+ 2.29	+ 44.75	- 14.39	+25 15 34.82
		E	...	10 52 44.0	2 28.0	43.35	46.90	.....	13 39 39.82	+ 0.35	- 35.58	+ 14.39	
20	δ Crateris	W	...	11 11 35.0	2 48.7	49.60	49.10	.....	306 49 33.25	+ 3.01	+ 14.62	- 1 18.85	-14 15 47.69
		E	...	11 17 1.0	2 37.3	44.55	47.45	.....	53 9 33.80	+ 0.92	- 12.71	+ 1 18.83	

Time.	Ther. 1904.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below					No.	Zenith point.	Red. to 1904 0.
<i>d h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>in</i>							<i>° ' "</i>	<i>"</i>
9 8 47	60.6			9 Instrument in meridian, observation at IX with movable thread.					1	359 50 37.27	
9 9 11	59.8	62.0	29.118	12.11 Instrument in meridian, observation at I with movable thread					2	38 43	
9 9 24	59.6								3	38 08	
9 9 36	59.3								4	16 79	
10 0	58.6	60.2	29.114						5	38 02	+ 21.62
11 8 4	51.6	54.9	29.588						6	34 88	
8 16	52.4								7	34 52	
9 1	51.0	53.3	29.606						8	34.86	+ 7.80
8 31	43.9	46.0	29.818						9	35.15	+ 5.10
8 48	43.2								10	37.01	
9 23	41.1								11	37.66	+ 7.53
9 31	40.3	41.8	29.810						12	37.72	
9 52	39.6			Notes					13	38.02	+ 4.72
10 2	39.6			1 W One microscope reading increased 20''.					14	36.90	
10 14	40.0			5.9 Clouds					15	37.08	
10 25	38.8	41.3	29.824						16	36.72	+ 11.49
10 51	38.7								17	35.78	
11 1	38.2								18	37.00	+ 0.15
11 15	38.6								19	37.09	+ 8.36
									20	36.44	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>e</i> Leonis	E W	...	11 22 31.0	2 44.8	50.55	49.20	...	41 22 57.00	+ 1.19	-17.41	+ 52.12	- 2 28 39.80
			...	11 27 41.0	2 25.2	50.55	49.20	...	318 36 15.32	+ 3.24	+13.52	- 52.12	
2	<i>o</i> Hydræ	W E	...	11 32 34.0	2 44.4	49.45	49.00	...	286 54 18.15	+ 2.87	+ 9.91	-3 12.42	-34 13 1.95
			...	11 38 54.0	3 35.6	45.30	47.30	...	73 4 59.35	+ 1.01	-17.04	+3 12.52	
3	April 16, L. 73 Draconis S. P.	W E	...	8 30 42.0	1 54.6	55.50	48.95	...	66 24 38.70	+ 2.12	+ 1.61	+2 14.20	+74 7 23.32
			...	8 35 12.0	2 35.4	51.35	47.35	...	293 34 33.62	+ 0.29	- 2.96	-2 14.24	
4	76 Draconis S. P.	E W	...	8 46 55.0	2 28.3	51.50	47.45	...	301 6 56.42	+ 0.38	- 1.49	-1 37.41	+82 10 24.64
			...	8 50 58.0	1 34.7	57.65	50.05	...	58 52 13.95	+ 3.19	+ 0.61	+1 37.43	
5	145 B. Lyncis	W E	...	9 0 ...	...	56.60	49.25	26.890	359 53 2.08	+ 1.83	- 0.27	- 0.09	+38 50 6.50
			...	...	...	51.60	47.25	26.890	0 3 24.02	- 0.40	+ 0.27	+ 0.09	
6	<i>θ</i> Ursæ Majoris	E W	...	9 23 23.0	2 54.0	54.35	48.35	...	346 47 36.95	+ 1.57	+34.55	- 13.86	+52 6 54.42
			...	9 28 32.5	2 15.5	58.25	49.60	...	13 11 18.55	+ 3.16	-20.96	+ 13.86	
7	<i>ψ</i> Leonis	W E	...	9 35 33.0	2 47.8	56.90	49.10	...	335 31 45.15	+ 2.57	+27.94	- 26.91	+14 27 28.54
			...	9 40 52.0	2 31.2	52.85	47.90	...	24 27 19.92	+ 0.96	-22.68	+ 26.92	
8	83 B. Leonis	E W	...	9 48 21.0	2 50.3	53.90	48.15	...	29 31 38.08	+ 1.36	-24.63	+ 33.54	+ 9 23 4.58
			...	9 53 42.5	2 31.2	58.20	49.55	...	330 27 35.08	+ 3.13	+19.41	- 33.54	
9	<i>η</i> Leonis	E W	...	9 59 7.0	2 49.6	53.30	47.85	...	21 41 17.92	+ 1.05	-31.54	+ 23.57	+17 13 40.64
			...	10 4 34.0	2 37.4	57.30	49.40	...	338 17 52.42	+ 2.83	+27.16	- 23.58	
10	22 Sextantis	W E	...	10 9 54.0	2 48.4	56.90	49.20	...	313 29 25.45	+ 2.61	+16.44	-1 2.42	- 7 35 38.02
			...	10 15 31.0	2 48.6	53.20	48.00	...	46 29 44.50	+ 1.11	-16.48	+1 2.43	
11	<i>α</i> Antliæ	E W	...	10 19 48.0	2 48.7	53.80	48.00	...	69 27 31.28	+ 1.25	-11.10	+2 37.13	-30 35 5.80
			...	10 25 11.0	2 34.3	57.35	49.20	...	290 31 38.68	+ 2.73	+ 9.29	-2 37.18	
12	33 Sextantis	W E	...	10 33 30.0	2 52.1	55.40	48.80	...	319 50 20.58	+ 2.00	+19.48	- 50.07	- 1 14 27.88
			...	10 38 7.0	1 44.9	52.60	47.65	...	40 8 37.60	+ 0.75	- 7.24	+ 50.08	
13	46 Leonis Minoris	E W	...	10 48 ...	...	53.30	47.90	27.520	4 9 6.12	+ 1.79	+ 0.23	+ 4.35	+34 43 51.95
			...	...	...	57.65	49.05	27.520	355 46 24.08	+ 3.54	- 0.31	- 4.36	
14	<i>ρ</i> ⁴ Leonis	W E	...	10 59 1.0	2 50.4	55.20	48.85	...	323 33 6.20	+ 2.01	+20.72	- 43.89	+ 2 28 23.54
			...	11 4 26.5	2 35.1	52.40	47.60	...	36 26 4.00	+ 0.65	-17.17	+ 43.91	
15	<i>δ</i> Crateris	E W	...	11 11 30.0	2 53.6	53.15	47.85	...	53 9 36.45	+ 1.02	-15.48	+1 19.32	-14 15 47.88
			...	11 17 0.0	2 36.4	56.70	49.20	...	306 49 36.28	+ 2.57	+12.57	-1 19.32	
16	<i>e</i> Leonis	W E	...	11 22 34.0	2 41.7	55.50	48.80	...	318 36 14.45	+ 2.03	+16.76	- 52.46	- 2 28 39.40
			...	11 27 44.0	2 28.3	51.85	47.50	...	41 22 54.15	+ 0.49	-14.10	+ 52.47	
17	Groombridge 1830	W E	...	11 47 ...	...	55.00	48.50	25.125	359 28 29.20	+ 1.03	- 0.26	- 0.54	+38 24 19.66
			...	...	...	52.00	47.55	25.125	0 30 22.95	- 0.19	+ 0.26	+ 0.54	
18	April 17, L. <i>σ</i> Sagittarii	W E	...	18 46 45.0	2 24.4	41.85	46.85	...	204 41 34.52	+ 0.33	+ 8.72	-2 8.38	-26 24 46.02
			...	18 51 53.0	2 43.6	44.30	48.00	...	65 17 41.90	+ 1.51	-11.19	+2 8.46	
19	<i>τ</i> Sagittarii	E W	...	18 57 56.0	2 51.4	45.00	48.05	...	66 41 13.58	+ 1.70	-12.00	+2 17.13	-27 48 27.05
			...	19 3 17.0	2 29.6	44.95	47.95	...	293 17 59.25	+ 1.67	+ 0.15	-2 17.18	
20	<i>δ</i> Draconis	W E	...	19 9 41.0	2 41.6	44.45	47.80	...	28 33 19.12	+ 1.43	- 8.87	+ 32.36	+67 29 23.29
			...	19 15 0.0	2 37.4	44.10	47.95	...	331 25 53.40	+ 1.45	+ 8.42	- 32.37	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
14 11 25	38.4	...	...	5. 17. Instrument in meridian, observation at IX with movable thread.	1	359 59 36.43	+14.04
11 36	38.2	...	...	13 Instrument in meridian; E. observation at I; W. observation at I+4° with movable thread.	2	37.18	+17.76
11 45	37.8	40.3	29.818		3	36.07	
16 8 34	41.6	43.3	29.892		4	36.54	
8 50	41.2	...	...		5	37.24	
9 27	40.6	42.1	29.926		6	36.91	
9 39	40.2	...	...		7	36.94	+11.95
9 52	39.8	...	...		8	36.22	+13.38
10 2	39.6	...	...		9	34.92	
10 13	39.2	...	...		10	36.82	
10 23	39.1	...	...		11	36.04	
10 32	38.6	40.3	29.934		12	36.59	
11 2	38.0	...	...	Notes.	13	36.91	
11 15	37.7	...	...	1 E Level correction assumed.	14	38.22	
11 26	37.6	...	...	7 E. One level reading decreased 10 div.	15	36.70	
11 49	36.7	39.3	29.968	16. Diffuse.	16	36.90	+13.98
17 18 50	36.3	38.4	29.776		17	37.90	
19 1	34.8	...	...		18	37.94	
19 14	34.4	...	...		19	36.65	-12.27
19 27	34.7	...	...		20	37.47	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Cygni	E		19 23 53.5	2 47.7	45.75	48.10	.....	11 10 10.72	+ 1.86	-54.50	+ 11.75	+27 45 22.56
		W		19 29 10.3	2 29.1	46.90	48.20	.....	348 49 7.92	+ 2.24	+43.09	- 11.74	
2	γ Aquilæ	W		19 38 42.5	2 49.4	44.60	48.00	.....	331 27 11.45	+ 1.57	+25.07	- 32.30	+10 52 44.71
		E		19 44 16.3	2 44.4	44.60	48.10	.....	28 31 59.48	+ 1.65	-23.61	+ 32.29	
3	April 18, L. 76 Draconis s. p.	W		8 46 57.0	2 26.5	39.25	47.50	.....	58 52 18.08	+ 1.07	+ 1.45	+1 33.66	+82 10 25.33
		E		8 52 18.0	2 54.5	39.95	48.10	.....	301 6 52.55	+ 1.57	- 2.06	-1 33.70	
4	ω Hydræ	E		8 58 4.0	2 41.5	39.50	48.55	.....	33 26 13.60	+ 1.66	-19.99	+ 37.48	+ 5 28 19.86
		W		9 3 22.5	2 37.0	38.10	47.90	.....	326 32 56.65	+ 1.01	+18.89	- 37.51	
5	θ Ursæ Majoris	W		9 23 29.5	2 47.3	36.15	47.35	.....	13 11 31.98	+ 0.29	-31.94	+ 13.35	+52 6 54.68
		E		9 28 34.5	2 17.7	41.35	49.50	.....	346 47 46.80	+ 2.67	+21.64	- 13.35	
6	ϕ Leonis	E		9 35 26.0	2 54.7	48.30	49.55	.....	24 27 25.22	+ 2.78	-30.28	+ 25.91	+14 27 28.66
		W		9 40 48.2	2 27.5	44.75	47.95	.....	335 31 50.72	+ 1.12	+21.59	- 25.92	
7	19 Leonis Minoris	W		9 52 .....	.....	43.00	47.25	25.600	2 34 31.85	- 0.46	- 0.30	+ 2.58	+41 30 44.04
		E		.....	.....	47.70	48.95	25.600	357 23 39.68	+ 1.02	+ 0.30	- 2.58	
8	α Leonis	E		10 0 13.0	2 53.2	48.75	49.40	.....	26 28 49.42	+ 2.81	-27.87	+ 28.40	+12 26 0.38
		W		10 5 15.5	2 9.3	44.85	48.00	.....	333 30 31.85	+ 1.10	+15.53	- 28.40	
9	22 Sextantis	E		10 9 57.0	2 45.3	48.20	49.35	.....	46 29 44.02	+ 2.67	-15.84	+1 0.02	7 35 38.20
		W		10 15 23.0	2 40.7	44.55	48.10	.....	313 29 24.98	+ 1.12	+14.97	-1 0.03	
10	α Antliæ	W		10 20 1.0	2 35.5	42.65	47.45	.....	290 31 34.60	+ 0.34	+ 9.43	-2 31.03	-30 35 6.24
		E		10 25 11.0	2 34.5	47.60	49.35	.....	69 27 35.00	+ 2.51	- 9.31	+2 31.06	
11	33 Sextantis	E		10 33 46.0	2 35.9	49.00	49.80	.....	40 8 45.10	+ 3.05	-15.98	+ 48.15	- 1 14 27.26
		W		10 38 51.0	2 29.1	45.25	48.45	.....	319 50 24.48	+ 1.43	+14.62	- 48.17	
12	46 Leonis Minoris	W		10 48 .....	.....	43.95	47.65	26.125	355 47 24.02	+ 0.02	- 0.23	- 4.19	+34 43 51.43
		E		.....	.....	48.00	49.50	26.125	4 10 3.80	+ 1.98	+ 0.23	+ 4.19	
13	γ Hydræ	E		10 57 51.0	2 42.5	50.00	49.80	.....	65 39 45.22	+ 3.35	-10.97	+2 5.89	-26 46 50.30
		W		11 3 16.0	2 42.5	45.50	48.05	.....	294 19 23.10	+ 1.33	+10.97	-2 5.95	
14	δ Ursæ Majoris (mean)	W		11 13 .....	.....	43.60	47.75	26.535	353 7 22.85	- 0.02	- 0.21	- 6.89	+32 4 4.42
		E		.....	.....	48.35	49.45	26.535	6 49 31.20	+ 2.02	+ 0.21	+ 6.89	
15	ϵ Leonis	E		11 22 36.0	2 39.6	50.05	50.00	.....	41 22 55.10	+ 3.42	-16.33	+ 50.52	- 2 28 39.12
		W		11 27 46.0	2 30.4	45.70	48.15	.....	318 36 15.70	+ 1.38	+14.50	- 50.55	
16	ω Hydræ	E		11 32 56.0	2 22.2	48.45	49.60	.....	73 4 53.82	+ 2.83	- 7.41	+3 6.65	-34 13 2.23
		W		11 38 27.0	3 8.8	44.50	47.80	.....	286 54 10.70	+ 1.00	+13.07	-3 6.78	
17	β Virginis	W		11 42 55.0	2 37.7	42.80	47.45	.....	323 22 55.75	+ 0.34	+17.68	- 42.69	+ 2 18 10.08
		E		11 48 13.0	2 40.3	48.35	49.50	.....	36 36 17.20	+ 2.72	-18.27	+ 42.70	
18	α Virginis	E		11 57 13.0	2 57.2	49.90	50.30	.....	29 38 54.90	+ 3.54	-26.58	+ 32.76	+ 9 15 49.24
		W		12 2 38.5	2 28.3	45.30	48.20	.....	330 20 22.50	+ 1.31	+18.62	- 32.76	
19	April 20, L. ζ Hydræ	E		8 47 21.0	2 48.4	50.15	48.55	.....	32 36 9.92	+ 0.04	-22.19	+ 37.46	+ 6 18 26.23
		W		8 52 35.5	2 26.1	52.75	49.15	.....	327 23 4.02	+ 1.91	+16.70	- 37.48	
20	ω Hydræ	W		8 58 3.0	2 42.4	50.85	48.55	.....	326 32 56.88	+ 1.13	+20.21	- 38.72	+ 5 28 19.74
		E		9 3 16.5	2 31.1	49.80	48.80	.....	33 26 11.25	+ 0.97	-17.50	+ 38.73	

Time	Ther- (880)	Atm- ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>			<i>mm</i>				
17 19 41		37.8	29.754	Instrument in meridian, observation at IX with movable thread.	1	359 59 35.67	
19 42	16.1				2	37.80	
18 8 41	16.9	68.4	29.709		3	36.41	
9 1	16.1				4	35.99	+ 15.27
9 7	16.1				5	35.72	
9 19	55.0				6	35.57	+ 11.87
9 35	16.1				7	37.14	
10 4	14.6	66.2	29.716		8	36.42	
10 13	14.6				9	35.96	
10 34	14.6				10	36.95	
10 42	14.7				11	36.34	
11 1	12.8	54.9	29.726		12	37.14	
11 26	11.7				13	36.47	+ 19.71
11 46	10.9				14	36.98	
11 46	10.7			Note 10.17 Unsteady	15	36.87	+ 11.99
12 1	10.9	61.9	29.722		16	36.94	+ 18.35
20 8 59	49.6	44.2	29.728		17	37.72	
9 1	49.5				18	37.14	
					19	35.64	
					20	36.48	+ 15.25

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 H. Draconis	E	...	9 20 27.0	2 50.9	51.80	48.65	.....	317 10 31.62	+ 1.41	+ 2.61	- 54.41	+81 45 11.89
		W	...	9 25 32.0	2 14.1	53.10	49.25	.....	42 48 36.72	+ 2.04	- 1.61	+ 54.42	
2	2 Sextantis	W	...	9 30 34.5	2 42.8	50.80	48.50	.....	326 9 20.50	+ 1.10	+20.11	- 39.39	+ 5 4 43.32
		E	...	9 35 54.0	2 36.7	49.95	48.40	.....	33 49 47.50	+ 0.85	-18.64	+ 39.40	
3	α Leonis	W	...	10 0 20.0	2 46.2	51.75	48.45	.....	333 30 22.98	+ 1.30	+25.66	- 29.34	+12 26 0.56
		E	...	10 5 30.0	2 23.8	50.05	48.30	.....	26 28 41.98	+ 0.80	-19.21	+ 29.34	
4	γ Leonis (1st star)	E	...	10 11 40.5	2 50.9	50.45	48.55	.....	18 35 38.75	+ 1.05	-36.43	+ 19.83	+20 19 28.91
		W	...	10 17 2.5	2 31.1	52.80	49.00	.....	341 23 37.08	+ 1.86	+28.48	- 19.84	
5	44 Hydræ	E	...	10 26 31.0	2 46.8	50.45	48.35	.....	62 8 33.20	+ 0.92	-12.27	+1 51.19	-23 15 21.16
		W	...	10 32 2.0	2 44.2	52.85	49.10	.....	297 50 34.72	+ 1.89	+11.89	-1 51.22	
6	l Leonis	W	...	10 41 10.5	2 53.0	50.05	48.20	.....	332 7 23.30	+ 0.76	+26.66	- 31.20	+11 3 0.26
		E	...	10 46 38.0	2 34.5	48.95	48.05	.....	27 51 42.08	+ 0.43	-21.27	+ 31.20	
7	χ Hydræ	W	...	10 58 7.0	2 26.5	50.10	48.35	.....	294 19 28.20	+ 0.87	+ 8.92	-2 9.89	-26 46 50.98
		E	...	11 3 11.0	2 37.5	49.00	47.95	.....	65 39 43.52	+ 0.39	-10.32	+2 9.90	
8	ξ Ursæ Majoris (mean)	E	...	11 13 .....	.....	50.05	48.45	26.865	6 49 17.00	+ 1.62	+ 0.21	+ 7.10	+32 4 4.24
		W	...	.....	.....	52.05	48.70	26.865	353 7 6.05	+ 2.24	- 0.21	- 7.10	
9	58 Ursæ Majoris	W	...	11 25 .....	.....	50.65	48.40	26.520	4 45 5.75	+ 0.28	- 0.32	+ 4.94	+43 41 58.34
		E	...	.....	.....	49.10	48.05	26.520	355 11 52.28	- 0.25	+ 0.32	- 4.94	
10	β Virginis	E	...	11 42 45.0	2 47.7	50.35	48.35	.....	36 36 18.38	+ 0.90	-19.99	+ 43.90	+ 2 18 8.96
		W	...	11 48 6.0	2 33.3	52.80	49.30	.....	323 22 52.88	+ 1.99	+16.71	- 43.91	
11	ο Virginis	W	...	11 57 23.5	2 46.6	50.75	48.50	.....	330 20 17.52	+ 1.07	+23.50	- 33.67	+ 9 15 48.66
		E	...	12 2 50.0	2 39.9	49.45	48.10	.....	29 38 51.95	+ 0.56	-21.64	+ 33.68	
12	δ Ursæ Majoris	E	...	12 7 46.0	2 45.9	49.75	48.40	.....	341 20 55.72	+ 0.78	+19.59	- 19.98	+57 33 56.63
		W	...	12 13 3.0	2 31.1	52.45	49.20	.....	18 38 10.38	+ 1.83	-16.26	+ 19.98	
13	14 Comæ Berenices	W	...	12 18 36.0	2 51.0	51.00	48.45	.....	348 51 27.02	+ 1.14	+56.86	- 11.66	+27 47 54.24
		E	...	12 23 54.5	2 27.5	49.70	48.35	.....	11 7 28.22	+ 0.77	-42.32	+ 11.65	
14	April 21, L. σ Sagittarii	E	...	18 46 24.0	2 45.4	52.05	49.00	.....	65 17 38.25	+ 1.05	-11.44	+2 9.37	-26 24 45.93
		W	...	18 52 31.0	3 21.6	52.95	48.95	.....	294 41 23.10	+ 1.25	+16.99	-2 9.42	
15	τ Sagittarii	W	...	18 57 56.0	2 51.4	50.90	48.30	.....	293 17 56.85	+ 0.42	+12.00	-2 18.10	-27 48 27.05
		E	...	19 3 22.0	2 34.6	50.10	48.40	.....	66 41 10.12	+ 0.25	- 9.77	+2 18.12	
16	δ Draconis	E	...	19 9 29.0	2 53.7	51.85	48.75	.....	331 25 50.70	+ 0.89	+10.25	- 32.57	+67 29 23.63
		W	...	19 15 9.0	2 40.3	52.55	49.05	.....	28 33 18.70	+ 1.19	- 9.40	+ 32.57	
17	β Cygni	W	...	19 23 50.5	2 50.7	50.00	48.20	.....	348 48 57.38	+ 0.12	+56.47	- 11.83	+27 45 23.02
		E	...	19 29 22.7	2 41.5	50.00	48.45	.....	11 10 8.05	+ 0.23	-50.55	+ 11.83	
18	γ Aquilæ	E	...	19 38 59.5	2 32.4	50.65	48.45	.....	28 31 54.12	+ 0.44	-20.29	+ 32.58	+10 22 44.79
		W	...	19 45 54.0	4 22.1	51.55	48.50	.....	331 26 34.95	+ 0.64	+59.98	- 32.61	
19	April 30, L. 1 H. Draconis	W	...	9 20 26.0	2 50.3	49.60	46.35	.....	42 48 42.28	+ 0.23	- 2.59	+ 51.68	+81 45 12.03
		E	...	9 25 40.0	2 32.7	50.20	46.55	.....	317 10 30.20	+ 0.47	+ 2.08	- 51.70	
20	2 Sextantis	E	...	9 31 13.0	2 4.0	51.70	47.25	.....	33 49 41.32	+ 1.25	-11.67	+ 37.43	+ 5 4 44.33
		W	...	9 35 26.0	2 9.0	52.75	47.30	.....	326 9 26.78	+ 1.52	+12.63	- 37.45	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
20 9 24	41.1		...	8. Instrument in meridian, observation at I with movable thread.	1	359 59 36.40	.....
9 34	41.1		...	9. Instrument in meridian, observation at IX with movable thread.	2	35 72	+14.96
10 3	40.5	42.3	29.806		3	36.76	.....
10 15	40.3		...		4	35.39	.....
10 30	39.9	41.7	29.818		5	35.16	+20.96
10 45	39.6		...		6	35.08	.....
11 1	39.5		...		7	35.80	+19.97
11 46	38.9	40.7	29.826		8	35.90	.....
12 1	38.7		...		9	37.39	+ 2.75
12 11	38.4		...		10	35.43	.....
12 23	38.6	40.0	29.842		11	36.48	.....
21 18 50	38.9	40.9	30.172		12	36.02	.....
19 1	38.7		...	Notes.	13	35.84	+ 6.36
19 13	38.6		...	14 W. One microscope reading decreased 10".	14	34.68	.....
19 29	38.6		...	14. Unsteady.	15	34.94	-12.52
19 43	38.1	40.4	30.188	19. Poor seeing.	16	36.10	.....
30 9 24	63.2		...		17	35.85	.....
9 34	62.6	64.1	29.606		18	34.90	.....
					19	36.12	.....
					20	35.00	+14.44

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	19 Leonis Minoris	E W	...	9 52 ...	...	51.20 53.40	47.20 47.70	27.040 27.040	357 22 39.08 2 33 30.85	+ 1.78 + 2.61	+ 0.30 - 0.30	- 2.53 + 2.53	+41 30.45.28
2	λ Hydrae	E W	...	10 2 52.0 10 7 28.0	2 52.8 1 43.2	51.80 53.45	47.10 48.15	...	50 47 3.92 309 12 16.58	+ 1.17 + 2.07	-16.00 + 5.71	+1 8.55 -1 8.56	-11 53 4.17
3	γ Leonis (1st star)	W E	...	10 11 35.5 10 17 10.7	2 55.6 2 39.6	52.55 51.55	47.55 47.45	...	341 23 30.22 18 35 36.12	+ 1.60 + 1.31	+38.47 -31.78	- 18.85 + 18.86	+20 19 30.21
4	May 1, L. 50 Draconis	W E	...	18 46 58.0 18 52 12.0	2 22.2 2 51.8	56.25 52.70	47.85 46.65	...	36 22 48.45 323 36 22.90	+ 2.01 + 0.51	- 3.67 + 5.35	+ 42.43 - 42.43	+75 19 8.19
5	π Sagittarii	E W	...	19 1 6.0 19 6 37.0	2 47.9 2 43.1	53.65 57.60	47.00 48.30	...	60 3 51.35 299 55 21.10	+ 0.97 + 2.58	-12.86 +12.14	+1 39.80 -1 39.80	-21 10 24.87
6	τ Draconis	W E	...	19 14 47.0 19 20 2.0	2 28.4 2 46.6	57.10 52.65	47.95 46.50	...	34 14 15.00 325 44 56.50	+ 2.25 + 0.44	- 4.81 + 6.06	+ 39.22 - 39.22	+73 10 30.69
7	ε Cygni	E W	...	19 26 34.0 19 30 47.8	0 33.6 3 40.2	53.20 58.25	46.95 48.40	...	347 23 42.98 12 36 25.82	+ 0.83 + 2.76	+ 1.36 -58.64	- 12.89 + 12.91	+51 31 22.03
8	δ Cygni	W E	...	19 42 ...	...	57.25 51.55	48.10 46.00	26.915 26.915	5 56 28.15 353 59 57.85	+ 1.64 - 0.78	- 0.34 + 0.34	+ 6.04 - 6.04	+44 53 38.81
9	γ Sagittæ	E W	...	19 51 27.5 19 56 38.5	2 51.9 2 19.1	52.35 58.20	46.35 48.40	...	19 41 16.58 340 18 5.28	+ 0.31 + 2.81	-35.13 +23.00	+ 20.66 - 20.66	+19 13 50.75
10	May 2, L. υ Ursæ Majoris	E W	...	9 41 9.0 9 47 10.0	2 50.9 3 10.1	54.90 53.20	47.95 46.95	...	339 25 27.28 20 33 48.75	+ 2.41 + 1.51	+17.91 -22.15	- 21.29 + 21.31	+59 29 28.31
11	16 Cephei s. p.	W E	...	9 56 32.0 10 0 18.0	1 10.7 2 35.3	53.95 55.30	47.05 47.10	...	68 18 42.62 291 40 30.58	+ 1.68 + 2.02	+ 0.68 - 3.27	+2 21.89 -2 21.93	+72 43 13.51
12	24 Cephei s. p.	E W	...	10 5 5.0 10 10 54.0	2 42.4 3 6.6	53.60 53.75	47.05 47.35	...	290 49 19.08 69 9 47.88	+ 1.63 + 1.85	- 3.72 + 4.92	-2 28.29 +2 28.37	+71 51 56.09
13	ρ Leonis	W E	...	10 24 44.0 10 30 11.0	2 51.7 2 35.3	53.00 54.85	46.55 47.50	...	330 52 18.35 29 6 40.48	+ 1.17 + 2.13	+25.33 -20.73	- 31.72 + 31.75	+ 9 47 52.00
14	ι Leonis	E W	...	10 41 19.0 10 46 48.0	2 44.0 2 45.0	54.80 54.20	47.75 47.20	...	27 51 43.78 332 7 25.88	+ 2.30 + 1.85	-23.97 +24.26	+ 30.16 - 30.17	+11 3 1.53
15	α Crateris	W E	...	10 52 9.0 10 57 33.0	2 47.4 2 36.6	52.65 54.60	46.65 47.40	...	303 18 0.05 56 41 10.22	+ 1.23 + 2.04	+13.54 -11.85	-1 26.70 +1 26.75	-17 47 32.77
16	η Leonis	E W	...	11 7 51.5 11 13 7.8	2 49.5 2 26.8	55.65 54.40	47.90 47.15	...	25 5 8.55 334 54 9.25	+ 2.55 + 1.93	-27.91 +20.94	+ 26.77 - 26.79	+13 49 44.43
17	58 Ursæ Majoris	E W	...	11 25 ...	...	54.45 53.50	47.50 47.05	27.135 27.135	355 11 21.60 4 44 40.80	+ 2.79 + 2.29	+ 0.32 - 0.32	- 4.79 + 4.79	+43 42 0.57
18	ζ Crateris	W E	...	11 36 56.0 11 42 21.0	2 48.6 2 36.4	52.15 54.60	46.25 47.55	...	303 16 17.68 56 42 54.12	+ 0.81 + 2.10	+13.73 -11.82	-1 27.14 +1 27.18	-17 49 16.50
19	ο Leonis	E W	...	11 48 15.0 11 53 5.5	2 19.9 2 30.6	55.10 53.15	47.50 46.55	...	22 44 4.18 337 15 3.20	+ 2.26 + 1.25	-20.63 +23.91	+ 24.05 - 24.07	+16 10 43.97
20	δ Ursæ Majoris	W E	...	12 9 1.0 12 13 17.0	1 30.4 2 45.6	50.50 53.30	45.85 46.80	...	18 38 5.35 341 20 53.72	+ 0.31 + 1.39	- 5.82 +19.52	+ 19.42 - 19.43	+57 33 58.78

Time.	Ther.	Atm. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>												
10 10 5	61.6		29.614	1.17. Instrument in meridian, observation at I with movable thread.						1	359 59 36.00	
10 10 15	61.6		29.615	8. Instrument in meridian, observation at IX with movable thread.						2	359 59 36.72	
10 10 28	60.6		29.616							3	359 59 37.98	
10 10 35		61.2	29.614							4	359 59 37.78	
10 10 41	62.0	64.0	29.615							5	359 59 37.04	
10 10 44	61.8									6	359 59 37.79	
10 10 48	61.9									7	359 59 37.56	
10 10 50	61.4	61.2	29.612							8	359 59 37.75	
10 10 54	62.0	64.1	30.024							9	359 59 36.42	
10 10 58	60.9									10	359 59 37.86	
10 10 57	60.0									11	359 59 37.14	+10.24
10 10 55	60.1									12	359 59 38.86	
10 10 57	61.7	61.1	30.612							13	359 59 37.88	
10 10 51	61.4									14	359 59 37.04	
10 10 49	62.2									15	359 59 37.64	+ 9.47
10 10 51	60.8									16	359 59 37.95	+ 0.50
										17	359 59 38.41	
										18	359 59 37.88	+ 7.87
										19	359 59 37.21	
										20	359 59 37.21	

Notes.

C. 12. Unsteady.

16 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>" ' "</i>	<i>' "</i>	<i>° ' "</i>
1	14 Comæ Berenices	E	...	12 18 58.0	2 28.6	53.45	46.90	...	11 7 26.98	+ 1.52	-42.95	+ 11.34	+27 47 56.54
		W	...	12 23 46.2	2 19.6	52.55	46.25	...	348 51 48.90	+ 1.00	+37.91	- 11.34	
2	f Virginis	W	...	12 28 52.0	2 49.5	51.05	46.05	...	315 46 38.20	+ 0.47	+17.41	- 56.01	- 5 18 21.66
		E	...	12 34 18.0	2 36.5	53.00	47.40	...	44 12 34.10	+ 1.60	-14.84	+ 56.03	
3	35 Virginis	E	...	12 40 18.0	2 30.8	55.25	47.55	...	34 48 47.45	+ 2.26	-16.85	+ 40.10	+ 4 5 40.35
		W	...	12 45 42.0	2 53.2	53.10	46.60	...	325 10 16.82	+ 1.21	+22.23	- 40.11	
4	ε Virginis	W	...	12 54 24.0	2 50.6	51.80	45.90	...	332 32 50.35	+ 0.57	+26.26	- 29.95	+11 28 25.22
		E	...	13 1 23.0	4 8.4	56.10	47.80	...	27 26 53.38	+ 2.59	-55.05	+ 29.97	
5	May 3, L. 50 Draconis	E	...	18 47 13.0	2 7.0	57.70	47.60	...	323 36 22.98	+ 1.11	+ 2.92	- 42.94	+75 19 8.63
		W	...	18 52 41.0	3 21.0	58.20	48.30	...	36 22 50.60	+ 1.60	- 7.32	+ 42.94	
6	τ Draconis	E	...	19 15 15.0	2 0.3	56.10	47.35	...	325 44 58.40	+ 0.62	+ 3.16	- 39.70	+73 10 30.81
		W	...	19 19 56.0	2 40.7	59.05	48.60	...	34 14 14.58	+ 1.94	- 5.64	+ 39.71	
7	ι Cygni	W	...	19 24 18.0	2 49.4	57.95	48.20	...	12 36 1.55	+ 1.54	-34.73	+ 13.05	+51 31 22.49
		E	...	19 29 42.3	2 34.9	54.80	47.05	...	347 23 13.80	+ 0.15	+29.03	- 13.05	
8	May 4, L. υ Ursæ Majoris	W	...	9 41 6.0	2 53.7	49.85	47.30	...	20 33 44.75	+ 0.57	-18.49	+ 21.21	+59 29 28.99
		E	...	9 46 13.0	2 13.3	51.45	47.60	...	339 25 32.80	+ 1.10	+10.89	- 21.21	
9	16 Cephei s. p.	E	...	9 55 40.0	2 2.5	52.55	47.55	...	291 40 28.45	+ 1.31	- 2.04	-2 21.30	+72 43 14.12
		W	...	10 0 10.0	2 27.6	52.00	47.90	...	68 18 39.02	+ 1.35	+ 2.96	+2 21.33	
10	24 Cephei s. p.	W	...	10 5 5.0	2 42.3	51.55	47.90	...	69 9 49.80	+ 1.30	+ 3.72	+2 27.64	+71 51 56.04
		E	...	10 10 37.0	2 49.7	52.55	47.80	...	290 49 18.38	+ 1.47	- 4.06	-2 27.72	
11	ρ Leonis	E	...	10 24 46.5	2 48.8	52.95	48.05	...	29 6 51.35	+ 1.68	-24.48	+ 31.61	+ 9 47 52.50
		W	...	10 30 13.5	2 38.2	52.70	47.40	...	330 52 20.50	+ 1.26	+21.50	- 31.63	
12	l Leonis	W	...	10 41 14.2	2 48.5	50.30	47.00	...	332 7 25.50	+ 0.52	+25.29	- 30.04	+11 3 1.83
		E	...	10 46 26.0	2 23.3	51.60	47.90	...	27 51 38.08	+ 1.30	-18.30	+ 30.05	
13	α Crateris	E	...	10 52 3.0	2 53.0	52.75	48.10	...	56 41 11.88	+ 1.67	-14.46	+1 26.35	-17 47 33.00
		W	...	10 57 35.0	2 39.0	51.65	47.20	...	303 17 59.12	+ 0.98	+12.22	-1 26.39	
14	n Leonis	W	...	11 7 52.2	2 48.5	49.80	46.95	...	334 54 3.22	+ 0.40	+27.59	- 26.66	+13 49 44.24
		E	...	11 13 11.0	2 30.3	51.95	47.35	...	25 5 3.78	+ 1.09	-21.95	+ 26.67	
15	83 Leonis	E	...	11 19 2.0	2 41.9	52.20	47.65	...	35 22 31.60	+ 1.28	-19.17	+ 40.46	+ 3 31 58.54
		W	...	11 24 13.5	2 29.6	51.80	47.30	...	324 36 40.85	+ 1.00	+16.37	- 40.48	
16	ζ Crateris	E	...	11 37 4.0	2 40.3	52.00	47.50	...	56 42 53.58	+ 1.16	-12.41	+1 26.73	-17 40 16.15
		W	...	11 42 27.0	2 42.7	51.05	47.25	...	303 16 16.35	+ 0.87	+12.79	-1 26.77	
17	o Leonis	W	...	11 47 41.8	2 52.8	49.80	46.85	...	337 14 57.42	+ 0.30	+31.47	- 23.95	+16 10 45.03
		E	...	11 53 2.5	2 27.9	51.60	47.55	...	22 44 6.75	+ 1.05	-23.06	+ 23.96	
18	2 Canum Venat.	E	1.5	12 11	...	53.65	48.10	27.770	357 41 13.98	+ 2.61	+ 0.29	- 2.27	+41 11 39.27
		W	...	...	...	52.85	47.60	27.770	2 13 55.45	+ 2.20	- 0.29	+ 2.27	
19	15 Comæ Berenices	W	...	12 19 12.5	2 47.0	50.30	46.55	...	349 51 34.72	+ 0.31	+58.98	- 10.24	+28 48 3.76
		E	...	12 23 59.5	2 0.0	51.70	47.60	...	10 7 8.85	+ 1.15	-30.47	+ 10.24	
20	f Virginis	E	...	12 29 7.0	2 34.2	53.10	48.10	...	44 12 31.28	+ 1.72	-14.40	+ 55.76	- 5 18 21.18
		W	...	12 34 16.5	2 35.3	52.70	47.30	...	315 46 38.42	+ 1.22	+14.61	- 55.77	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
2 12 21	55.2	57.8	30.068	18. Instrument in meridian, observation at I with movable thread.						1	389 59 36.68	+ 4.36
12 32	55.2	...	...							2	38.48	
12 43	54.6	...	...							3	36.56	
12 58	54.6	56.3	30.068							4	38.76	
3 18 50	50.0	52.1	30.102							5	35.94	
19 4	50.1	...	...							6	36.54	
19 18	49.7	...	...							7	35.07	
19 38	50.3	...	...							8	35.81	
19 45	...	52.2	30.116							9	35.54	+10.25
4 9 44	64.5	65.8	30.058							10	35.26	
9 58	63.9	...	...							11	35.90	
10 8	63.6	...	...							12	36.20	
10 28	62.2	...	...							13	35.68	
10 44	61.6	63.3	30.050							14	37.07	+ 9.34
10 55	61.2	...	...							15	35.96	
11 11	60.6	...	...							16	36.15	
11 21	60.3	...	...							17	36.07	+ 7.70
11 40	59.6	61.2	30.052							18	36.10	
11 50	59.1	...	...							19	36.77	+ 3.82
12 17	57.8	...	...							20	36.42	
12 32	57.1	...	...							

Notes.
2 W. One microscope reading decreased 30".
3.4. Poor; clouds.
5. Very faint; clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	35 Virginis	W		12 40 14.0	2 34.6	50.40	46.50	.....	325 10 22.32	+ 0.24	+ 17.71	- 39.89	+ 4 5 40.16
		E		12 46 10.0	3 27.4	52.90	48.05	.....	34 49 3.88	+ 1.67	- 31.87	+ 39.91	
2	48 Virginis	E		12 56 1.0	2 47.2	54.80	48.35	.....	42 3 14.40	+ 2.30	- 17.68	+ 51.86	- 3 8 58.08
		W		13 1 5.0	2 16.8	53.50	47.35	.....	317 55 59.72	+ 1.52	+ 11.84	- 51.87	
	May 5, L.												
3	25 H. Camelop.s.p.	W		10 8 21.0	2 20.0	54.35	47.65	.....	58 26 44.65	+ 1.43	+ 1.26	+ 33.46	+ 82 35 58.54
		E		10 13 24.0	2 43.0	51.80	46.60	.....	301 32 26.32	+ 0.26	- 1.71	- 33.47	
4	4 Cygni	E		10 23 .....	.....	51.40	46.55	26.325	2 46 22.40	+ 0.87	+ 0.24	+ 2.81	+ 36 7 26.24
		W		.....	.....	55.25	48.00	26.325	357 10 45.78	+ 2.56	- 0.24	- 2.81	
5	κ Aquilæ	W		10 28 50.0	2 43.7	54.00	47.55	.....	313 50 43.40	+ 1.29	+ 15.64	- 59.87	- 7 14 19.57
		E		10 33 56.5	2 22.8	51.30	46.60	.....	46 8 25.02	+ 0.13	- 11.90	+ 59.87	
6	δ Cygni	E	2	19 42 .....	.....	51.20	46.60	26.090	354 0 28.52	+ 0.85	+ 0.34	- 6.02	+ 44 53 39.38
		W		.....	.....	55.40	48.50	26.090	5 57 0.40	+ 2.85	- 0.34	+ 6.02	
7	γ Sagittæ	W		19 51 28.3	2 49.9	54.95	48.25	.....	340 17 55.00	+ 1.92	+ 34.32	- 20.63	+ 19 13 51.32
		E		19 56 48.5	2 29.3	51.30	46.55	.....	19 41 7.22	+ 0.14	- 26.50	+ 20.63	
8	α ¹ Cygni	E		20 11 .....	.....	51.50	46.60	25.905	352 27 23.10	+ 0.94	+ 0.36	- 7.62	+ 46 26 52.51
		W		.....	.....	55.75	48.35	25.905	7 30 18.18	+ 2.85	- 0.36	+ 7.61	
	May 7, L.												
9	29 H. Camelop.	E		10 12 17.0	3 18.5	53.10	47.20	.....	314 11 13.60	+ 0.92	+ 2.13	- 57.50	+ 84 44 33.09
		W		10 17 8.0	1 32.5	53.40	47.10	.....	45 47 53.78	+ 0.97	- 0.46	+ 57.52	
10	9 H. Draconis	W		10 24 6.0	2 40.4	51.60	47.05	.....	37 16 15.98	+ 0.44	- 4.30	+ 42.58	+ 76 12 34.68
		E		10 29 30.0	2 43.6	51.90	47.55	.....	322 42 56.18	+ 0.79	+ 4.47	- 42.59	
11	ν Hydræ	E		10 42 17.0	2 26.2	53.60	47.10	.....	54 35 31.15	+ 1.01	- 10.71	+ 18.67	- 15 41 46.54
		W		10 46 51.0	2 7.8	54.70	47.60	.....	305 23 42.50	+ 1.54	+ 8.18	- 18.69	
12	δ Leonis	W		10 52 35.0	2 51.0	52.55	47.15	.....	325 12 23.45	+ 0.73	+ 21.69	- 38.92	+ 4 7 46.82
		E		10 58 3.0	2 37.0	52.25	47.30	.....	34 46 45.45	+ 0.74	- 18.28	+ 38.93	
13	237 B. Ursæ Majoris	E		11 8 9.5	2 57.7	54.05	47.55	.....	348 54 15.48	+ 1.30	+ 44.79	- 11.00	+ 50 0 3.02
		W		11 13 32.5	2 25.3	54.90	47.50	.....	11 4 40.56	+ 1.50	- 29.96	+ 11.00	
14	85 Leonis	W		11 18 49.0	2 54.7	53.00	47.35	.....	324 36 36.55	+ 0.96	+ 22.29	- 39.86	+ 3 31 59.50
		E		11 24 16.5	2 32.8	52.85	47.20	.....	35 22 30.82	+ 0.83	- 17.05	+ 39.87	
15	ν Virginis	E		11 38 22.5	2 23.1	53.25	47.05	.....	31 50 41.58	+ 0.87	- 16.34	+ 34.92	+ 7 3 52.40
		W		11 43 6.0	2 20.4	55.35	47.85	.....	328 8 29.72	+ 1.78	+ 15.73	- 34.93	
16	δ Virginis	W		11 52 1.5	2 50.5	52.85	47.20	.....	325 15 49.36	+ 0.89	+ 21.50	- 38.98	+ 4 11 12.60
		E		11 57 31.0	2 39.0	51.70	47.05	.....	34 43 20.45	+ 0.51	- 18.78	+ 38.99	
17	2 Canum Venat.	W		12 11 .....	.....	53.35	47.50	25.755	2 15 21.18	+ 0.41	- 0.29	+ 2.23	+ 41 11 40.65
		E		.....	.....	51.50	47.00	.....	357 43 14.95	- 0.31	+ 0.29	- 2.23	
18	15 Comæ Berenices	E		12 19 2.5	2 56.8	52.50	47.00	.....	10 7 43.65	+ 0.70	- 6.08	+ 10.07	+ 28 48 3.88
		W		12 24 25.5	2 26.2	55.35	47.85	.....	349 51 45.58	+ 1.84	+ 45.21	- 10.06	
19	ζ Virginis	W	1.5	12 32 5.0	2 2.8	53.60	47.50	.....	313 36 55.85	+ 1.18	+ 8.76	- 59.03	- 7 28 13.36
		E		12 36 40.0	2 32.2	51.40	46.85	.....	46 22 21.10	+ 0.30	- 13.46	+ 59.06	
20	ρ Centauri	E		12 42 32.0	2 47.5	52.40	47.00	.....	72 20 56.65	+ 0.64	- 10.42	+ 55.14	- 33 28 49.16
		W		12 47 55.0	2 35.5	55.15	47.75	.....	287 38 14.60	+ 1.76	+ 8.98	- 55.17	

Time.	Ther. corr.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904 0
<i>h m s</i>	<i>s</i>	<i>s</i>	<i>in</i>	<i>h m s</i>	<i>h m s</i>	<i>h m s</i>	<i>h m s</i>		<i>° ' "</i>	<i>"</i>
4 12 41	56.9	59.2	10 000	4.6.8	Instrument in meridian, observation at I with movable thread.			1	100 59 46.98	
4 12 43	55.7		10 000	15	Instrument in meridian, W. observation at IX with movable thread, E. observation at IX with fixed thread.			2	36.04	+ 9.69
4 12 45	55.9	58.2	10 000					3	36.10	
4 12 47	51.0	56.2	29 970					4	36.04	+ 4.13
4 12 49	51.9							5	36.79	
4 12 51	51.5	55.6	29 966					6	36.94	
4 12 53	51.1							7	36.25	
4 12 55	50.1	55.8	29 998					8	35.62	
4 12 57	50.2							9	35.48	
4 12 59	50.2							10	36.78	
4 13 01	50.5							11	36.82	
4 13 03	50.9	56.2	29 861					12	36.90	
4 13 05	50.6							13	36.84	- 1.90
4 13 07	50.9							14	37.20	
4 13 09	50.9							15	36.66	+ 10.28
4 13 11	50.7							16	37.02	+ 10.62
4 13 13	50.1	56.0	29 872					17	36.59	
4 13 15	50.2							18	35.46	+ 3.44
4 13 17	50.2							19	36.88	+ 11.71
4 13 19	50.9							20	36.09	+ 15.38

Notes.

1 E. Paint

8 E. Observation doubtful.

10 Paint; clouds.

20 Unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	48 Virginis	W	...	12 56 5.5	2 42.5	53.40	47.40	.....	317 55 55.25	+ 1.13	+16.70	- 50.83	- 3 8 57.90
		E	...	13 1 17.5	2 29.5	51.05	46.70	.....	42 3 14.70	+ 0.16	-14.13	+ 50.84	
2	19 Canum Venat.	E	...	13 11 ....	.....	52.10	46.95	27.595	357 31 18.82	+ 1.29	+ 0.29	- 2.40	+41 21 43.26
		W	...	.....	.....	54.40	47.65	27.595	2 24 6.65	+ 2.24	- 0.29	+ 2.40	
3	i Virginis	W	...	13 18 40.0	2 49.4	53.45	47.45	.....	308 52 35.18	+ 1.12	+15.29	-1 9.86	-12 12 38.23
		E	...	13 24 7.0	2 37.6	51.15	46.65	.....	51 6 34.95	+ 0.15	-13.23	+1 9.84	
4	May 9, L. 25 H. Camelop. s. p.	E	4	19 7 50.0	2 50.0	44.85	46.75	.....	301 32 24.68	+ 0.36	- 1.86	-1 32.69	+82 35 57.31
		W	...	19 13 26.0	2 46.0	50.35	49.15	.....	58 26 44.90	+ 2.93	+ 1.77	+1 32.72	
5	4 Cygni	W	...	19 23 ....	.....	49.95	49.15	26.860	357 10 24.52	+ 2.10	- 0.24	- 2.79	+36 7 25.79
		E	...	.....	.....	44.25	46.75	26.860	2 46 3.02	- 0.75	+ 0.48	+ 2.79	
6	κ Aquilæ	E	...	19 31 2.0	0 31.2	44.40	47.00	.....	46 8 13.90	+ 0.36	- 0.57	+ 59.40	- 7 14 19.82
		W	...	19 34 25.0	2 51.8	51.35	49.80	.....	313 50 38.60	+ 3.51	+17.23	- 59.43	
7	May 10, L. ν Hydræ	W	...	10 42 12.0	2 30.6	49.55	47.25	.....	305 23 42.62	+ 1.23	+11.37	-1 19.56	-15 41 45.73
		E	...	10 46 15.0	1 32.4	51.20	48.65	.....	54 35 23.08	+ 2.32	- 4.28	+1 19.54	
8	d Leonis	E	...	10 52 37.0	2 48.5	53.05	48.95	.....	34 46 44.18	+ 2.90	-21.06	+ 39.35	+ 4 7 48.33
		W	...	10 57 46.5	2 21.0	51.55	47.20	.....	325 12 31.48	+ 1.63	+14.75	- 39.36	
9	237 B. Ursæ Majoris	W	...	11 8 25.0	2 41.6	49.35	47.15	.....	11 4 48.70	+ 1.08	-37.05	+ 11.13	+50 0 3.75
		E	...	11 13 36.5	2 29.9	50.85	48.55	.....	348 54 27.00	+ 2.13	+31.89	- 11.13	
10	τ Leonis	E	3	11 20 4.0	2 45.5	53.95	48.55	.....	35 31 35.62	+ 2.96	-19.96	+ 40.58	+ 3 22 54.55
		W	...	11 25 24.0	2 34.5	50.85	46.95	.....	324 27 36.58	+ 1.39	+17.40	- 40.60	
11	ν Virginis	W	...	11 37 54.0	2 51.0	47.95	46.40	.....	328 8 25.62	+ 0.33	+23.33	- 35.33	+ 7 3 52.67
		E	...	11 43 16.5	2 31.5	51.25	48.20	.....	31 50 43.05	+ 2.07	-18.31	+ 35.34	
12	b Virginis	E	...	11 52 10.0	2 41.5	53.50	48.60	.....	34 43 17.05	+ 2.87	-19.37	+ 39.46	+ 4 11 13.65
		W	...	11 57 21.0	2 29.5	51.50	47.35	.....	325 15 54.88	+ 1.77	+16.60	- 39.48	
13	1 Canum Venat.	W	...	12 7 1.0	2 46.7	49.15	46.80	.....	15 2 41.10	+ 0.85	-26.71	+ 15.34	+53 58 10.59
		E	...	12 13 34.0	3 46.3	51.95	48.20	.....	344 56 6.78	+ 2.31	+49.19	- 15.35	
14	δ Corvi	W	...	12 21 59.0	2 44.7	50.40	46.85	.....	305 6 23.18	+ 1.17	+13.52	-1 21.02	-15 59 4.57
		E	...	12 27 9.0	2 25.3	52.70	48.40	.....	54 52 46.48	+ 2.53	-10.53	+1 21.06	
15	May 11, L. 29 H. Camelop.	W	...	10 14 14.0	1 20.1	48.95	48.00	.....	45 47 51.98	+ 1.06	- 0.35	+ 58.30	+84 44 32.40
		E	...	10 17 28.0	1 53.9	50.70	48.35	.....	314 11 15.68	+ 1.65	+ 0.70	- 58.30	
16	9 H. Draconis	E	...	10 24 12.0	2 33.5	48.35	47.50	.....	322 42 56.42	+ 0.62	+ 3.93	- 43.18	+76 12 34.88
		W	...	10 29 5.0	2 19.5	48.15	47.80	.....	37 16 13.38	+ 0.70	- 3.25	+ 43.18	
17	42 Leonis Minoris	W	...	10 40 ....	.....	48.95	48.35	25.575	352 15 11.55	+ 0.48	- 0.20	- 7.71	+31 11 14.27
		E	...	.....	.....	48.95	47.40	25.575	7 43 1.22	- 0.01	+ 0.20	+ 7.71	
18	47 Ursæ Majoris	E	...	10 54 ....	.....	47.55	47.80	27.350	357 56 35.15	+ 1.29	+ 0.29	- 2.01	+40 56 36.10
		W	...	.....	.....	49.75	47.95	27.350	1 59 9.72	+ 1.94	- 0.29	+ 2.01	
19	β Crateris	W	3	11 3 51.0	2 54.6	47.25	47.10	.....	298.47 23.70	+ 0.17	+13.65	-1 43.06	-22 18 25.01
		E	...	11 9 13.0	2 27.4	48.65	47.80	.....	61 11 43.78	+ 0.88	- 9.73	+1 43.08	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>							<i>° ' "</i>	<i>"</i>	
7 12 59	62.7	...	...	2.18.	Instrument in meridian, observation at I with movable thread.					1	359 59 36.91	+ 9.60
13 22	62.4	64.1	29.868	5.	Instrument in meridian; W. observation at IX; E. observation at IX+10° with movable thread.					2	36.60	+ 0.17
9 19 11	54.0	56.1	29.712	17.	Instrument in meridian, observation at IX with movable thread.					3	36.72	+ 9.83
19 33	53.6	...	...							4	36.40	...
19 55	53.5	55.3	29.728							5	36.64	+ 3.46
10 10 45	59.3	62.1	29.816							6	36.50	...
10 56	59.1	...	...							7	38.16	...
11 12	58.1	...	...							8	36.94	...
11 23	57.5	...	...							9	36.88	- 2.42
11 41	57.2	60.0	29.810							10	36.98	...
11 55	56.6	...	...							11	38.05	+ 9.98
12 10	56.5	...	...	4.	Very unsteady.					12	36.89	+10.34
12 25	55.9	...	...	5. 6. 14.	Clouds.					13	36.76	- 3.49
12 55	...	57.8	29.868	13. 15.	Very faint.					14	38.20	...
11 10 17	61.2	64.7	29.976	17 W.	Observation doubtful.					15	35.36	...
10 27	61.0	...	...							16	35.90	...
10 51	60.6	...	...							17	36.23	...
11 7	60.2	63.3	29.980							18	36.14	+ 0.18
										19	36.24	...

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	λ Ursæ Minoris	W	...	19 11 20.0	6 57.0	50.40	47.40	.....	50 2 47.48	+ 0.83	- 1.69	+1 9.33	+88 59 36.97
		E	...	19 16 22.0	1 55.0	49.95	47.30	.....	309 56 24.12	+ 0.64	+ 0.13	-1 9.33	
2	β Sagittæ	W	...	19 33 45.5	2 48.0	50.15	47.50	.....	338 19 24.55	+ 0.83	+30.98	- 23.13	+17 15 13.64
		E	...	19 39 10.5	2 37.0	48.10	47.00	.....	21 39 43.32	+ 0.08	-27.05	+ 23.14	
3	ϵ Draconis	E	2.5	19 46 2.0	2 18.3	49.30	47.20	.....	328 54 6.48	+ 0.50	+ 5.37	- 35.12	+70 31 16.41
		W	...	19 51 6.0	2 45.7	53.00	48.50	.....	31 5 7.05	+ 2.03	- 7.71	+ 35.15	
4	θ Aquilæ	W	...	20 3 21.0	2 49.3	50.05	47.55	.....	319 58 32.65	+ 0.81	+18.91	- 48.94	- 1 6 16.73
		E	...	20 10 49.5	4 39.2	48.60	47.25	.....	40 1 12.50	+ 0.32	-51.40	+ 49.00	
5	γ Cygni	E	...	20 19 .....	.....	49.95	47.75	26.945	358 56 34.52	+ 1.46	+ 0.19	- 1.05	+39 56 52.42
		W	...	.....	.....	53.15	48.30	26.945	0 59 43.00	+ 2.57	- 0.19	+ 1.04	
6	May 12, L. 36 Ursæ Majoris	W	...	10 23 44.0	0 33.8	43.95	45.25	.....	17 32 28.80	+ 0.14	- 0.89	+ 17.59	+56 28 26.01
		E	...	10 27 29.0	3 11.2	48.20	48.25	.....	342 26 13.60	+ 2.77	+28.40	- 17.61	
7	42 Leonis Minoris	E	...	10 40 .....	.....	48.00	47.50	28.205	7 41 11.12	+ 3.03	+ 0.20	+ 7.58	+31 11 14.70
		W	...	.....	.....	48.05	47.65	28.205	352 13 22.45	+ 3.12	- 0.20	- 7.58	
8	47 Ursæ Majoris	W	...	10 54 .....	.....	45.55	46.40	25.500	2 0 28.25	+ 0.37	- 0.29	+ 1.97	+40 56 35.91
		E	...	.....	.....	46.30	46.95	25.500	357 57 52.78	+ 0.91	+ 0.29	- 1.97	
9	β Crateris	E	...	11 4 2.0	2 43.4	48.50	47.40	.....	61 11 45.82	+ 2.40	-11.96	+1 41.49	-22 18 24.33
		W	...	11 9 6.0	2 20.6	48.50	47.35	.....	298 47 25.88	+ 2.37	+ 8.85	-1 41.55	
10	τ Leonis	W	...	11 19 59.0	2 50.1	45.60	46.35	.....	324 27 34.68	+ 1.15	+21.09	- 40.04	+ 3 22 55.25
		E	...	11 25 22.0	2 32.9	46.65	46.75	.....	35 31 35.30	+ 1.61	-17.04	+ 40.05	
11	χ Ursæ Majoris	E	...	11 41 .....	.....	48.45	47.65	27.360	350 34 33.92	+ 3.19	+ 0.37	- 9.28	+48 18 44.81
		W	...	.....	.....	49.00	47.30	27.360	9 21 12.20	+ 3.18	- 0.37	+ 9.28	
12	π Virginis	W	...	11 52 48.5	2 57.9	46.15	46.45	.....	328 13 20.52	+ 1.32	+25.31	- 34.79	+ 7 8 50.21
		E	...	11 58 14.0	2 27.6	47.20	47.30	.....	31 45 46.08	+ 2.02	-17.42	+ 34.80	
13	ι Canum Venat.	E	...	12 6 54.5	2 52.8	49.25	47.65	.....	344 56 27.95	+ 2.65	+28.70	- 15.14	+53 58 11.08
		W	...	12 12 9.0	2 21.7	49.20	47.20	.....	15 2 34.52	+ 2.42	-19.30	+ 15.14	
14	33 H ¹ . Virginis	W	...	12 19 54.0	2 51.5	47.95	46.90	.....	316 59 41.08	+ 2.01	+18.25	- 52.44	- 4 5 12.99
		E	...	12 25 22.0	2 36.5	47.40	46.90	.....	42 59 29.30	+ 1.86	-15.20	+ 52.46	
15	χ Virginis	E	...	12 31 16.5	2 50.5	48.65	47.55	.....	46 22 22.25	+ 2.45	-16.89	+ 59.03	- 7 28 12.25
		W	...	12 36 41.0	2 34.0	48.85	47.25	.....	313 36 51.68	+ 2.37	+13.78	- 59.02	
16	ρ Centauri	W	...	12 42 27.0	2 51.7	47.20	46.75	.....	287 38 15.60	+ 1.77	+10.95	-2 55.08	-33 28 47.81
		E	...	12 49 49.0	4 30.3	48.50	47.45	.....	72 21 11.92	+ 2.40	-27.13	+2 55.22	
17	ϵ Virginis	E	...	12 54 29.5	2 43.8	49.00	47.60	.....	27 26 21.28	+ 2.57	-24.21	+ 29.27	+11 28 25.70
		W	...	12 59 46.0	2 32.7	50.00	47.50	.....	332 32 52.22	+ 2.79	+21.04	- 29.28	
18	19 Canum Venat.	W	2.5	13 11 .....	.....	47.00	46.80	25.990	2 25 17.12	+ 0.97	- 0.29	+ 2.41	+41 21 44.37
		E	...	.....	.....	47.10	47.05	25.990	357 32 26.05	+ 1.09	+ 0.29	- 2.41	
19	δ Virginis	E	...	13 18 43.0	2 45.6	48.35	47.60	.....	51 6 34.22	+ 2.42	-14.61	+1 9.90	-12 12 37.54
		W	...	13 24 8.0	2 39.4	50.05	48.05	.....	308 52 36.65	+ 3.07	+13.53	-1 9.94	
20	25 Canum Venat.	W	...	13 33 .....	.....	48.35	47.40	26.100	357 50 30.90	+ 1.57	- 0.25	- 2.11	+36 46 59.16
		E	...	.....	.....	46.70	40.75	26.100	2 7 2.10	+ 0.87	+ 0.25	+ 2.11	

Time.	Ther- moe.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>								<i>° ' "</i>	<i>"</i>
11 19 15	49.7	...	...	Instrument in meridian, observation at II with movable thread.						1	359 59 35.70	
11 19 29	49.6	51.0	30.901	Instrument in meridian, observation at I with movable thread.						2	36.40	
11 19 37	49.4	...	...	Instrument in meridian, observation at IX with movable thread.						3	36.86	
11 19 50	45.6	...	...							4	36.92	
11 19 58	45.1	...	...							5	36.42	
11 20 04	47.1	49.7	16.549							6	36.40	
11 20 27	71.1	71.7	29.987							7	36.87	
11 20 44	66.2	...	...							8	37.70	+ 0.05
11 21 7	66.7	...	...							9	36.65	
11 21 23	62.9	66.7	29.980							10	38.40	
11 21 45	66.6	...	...							11	38.74	
11 21 55	66.2	...	...							12	38.92	
11 21 59	66.4	...	...							13	38.47	- 3.94
11 22 11	65.4	67.9	29.980							14	38.66	+ 11.24
11 22 14	66.1	...	...							15	37.82	+ 11.49
11 22 40	66.9	...	...							16	37.89	+ 11.80
11 22 57	61.1	...	...							17	37.84	
11 23 11	61.6	...	...							18	39.16	- 1.07
11 23 14	61.1	63.8	29.979							19	37.69	+ 9.72
										20	38.76	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	May 15, L. 225 B. Draconis	W E	...	19 23 10.0 19 29 6.0	4 3.3 1 43.7	51.05 50.50	50.10 49.95	..... .....	40 28 9.12 319 31 8.52	+ 1.07 + 0.89	- 7.11 + 1.29	+ 49.62 - 49.62	+79 24 32.59
2	β Sagittæ	E W	...	19 33 34.5 19 39 46.0	2 58.4 3 13.1	50.45 51.15	49.95 50.15	..... .....	21 39 48.72 338 19 14.88	+ 0.91 + 1.16	- 34.93 + 40.92	+ 23.13 - 23.14	+17 15 14.78
3	ϵ Draconis	W E	...	19 45 41.0 19 50 49.0	2 38.8 2 29.2	50.40 49.80	49.95 49.70	..... .....	31 5 9.45 328 54 3.20	+ 0.87 + 0.63	- 7.08 + 6.25	+ 35.10 - 35.09	+70 1 18.46
4	θ Aquilæ	E W	...	20 3 23.0 20 8 21.0	2 46.7 2 11.3	50.70 51.00	49.95 50.05	..... .....	40 0 37.78 319 58 40.02	+ 0.92 + 1.06	- 18.33 + 11.37	+ 48.85 - 48.85	- 1 6 16.03
5	γ Cygni	W E	2.5	20 19 ..... .....	..... .....	49.60 49.30	49.40 49.60	25.935 25.935	1 0 28.40 358 57 17.78	- 0.36 - 0.31	- 0.28 + 0.28	+ 1.04 - 1.04	+39 56 52.82
6	ϵ Delphini	E W	...	20 25 37.0 20 31 2.0	2 49.1 2 35.9	50.40 51.55	49.75 50.10	..... .....	27 56 7.52 332 3 7.50	+ 0.81 + 1.22	- 25.42 + 21.61	+ 30.87 - 30.87	+10 58 39.62
7	May 16, L. 36 Ursæ Majoris	E W	...	10 22 7.0 10 29 6.5	2 9.9 4 49.6	50.00 49.40	51.00 50.40	..... .....	342 26 29.70 17 33 33.05	+ 2.03 + 1.64	+ 13.11 - 1 5.10	- 17.80 + 17.83	+56 28 26.97
8	39 Ursæ Majoris	W E	...	10 37 14.0 10 42 52.3	0 13.4 5 24.9	47.90 47.95	50.10 50.35	..... .....	18 46 15.65 341 11 40.98	+ 1.03 + 1.27	- 0.13 + 14.23	+ 19.16 - 19.18	+57 42 15.98
9	β Ursæ Majoris	E W	...	10 55 28.0 11 0 29.5	0 23.0 4 38.5	49.50 49.95	50.20 50.45	..... .....	342 1 16.70 17 58 53.10	+ 1.54 + 1.82	+ 0.40 - 58.17	- 18.30 + 18.34	+56 53 54.16
10	θ Leonis	W E	...	11 6 16.0 11 11 25.0	2 44.4 2 24.6	48.95 48.35	49.80 50.05	..... .....	337 1 25.60 22 57 42.40	+ 1.21 + 1.21	+ 28.26 - 21.86	- 23.94 + 23.96	+15 57 9.49
11	γ Crateris	E W	...	11 17 8.0 11 22 50.0	2 45.7 2 56.3	49.20 50.70	50.05 50.10	..... .....	56 3 23.22 303 55 47.35	+ 1.41 + 1.82	- 13.42 + 15.18	+1 23.83 - 1 23.87	-17 9 40.50
12	χ Ursæ Majoris	W E	...	11 41 ..... .....	..... .....	47.65 47.85	49.55 49.65	25.365 25.365	9 22 35.98 350 35 56.88	- 0.01 + 0.17	- 0.37 + 0.37	+ 9.37 - 9.37	+48 18 45.24
13	π Virginis	E W	...	11 52 57.0 11 58 19.5	2 48.7 2 33.8	49.85 51.25	50.30 50.05	..... .....	31 45 49.45 328 13 25.95	+ 1.72 + 1.91	- 22.76 + 18.91	+ 35.09 - 35.10	+ 7 8 50.86
14	γ Corvi	W E	...	12 7 58.0 12 12 54.0	2 42.9 2 13.1	47.40 48.05	48.75 49.50	..... .....	304 4 45.88 55 54 25.02	+ 0.27 + 0.78	+ 13.00 - 8.68	- 1 23.66 + 1 23.70	-17 0 45.88
15	33 H ¹ . Virginis	E W	...	12 19 49.0 12 24 59.0	2 55.7 2 14.3	49.70 51.10	49.80 49.90	..... .....	42 59 31.75 316 59 46.72	+ 1.41 + 1.82	- 19.16 + 11.19	+ 52.89 - 52.90	- 4 5 13.25
16	9 Canum Venat.	W E	...	12 34 ..... .....	..... .....	49.10 47.95	49.15 48.95	26.450 26.450	2 27 24.78 357 29 38.72	+ 0.20 - 0.16	- 0.30 + 0.30	+ 2.46 - 2.46	+41 24 12.15
17	May 18, L. 225 B. Draconis	E W	...	19 24 39.0 19 29 3.0	2 43.1 1 40.9	52.00 51.30	50.95 50.70	..... .....	319 31 2.68 40 28 2.95	+ 1.74 + 1.47	+ 3.20 - 1.22	- 48.24 + 48.23	+79 24 32.81
18	ϵ Sagittarii	W E	3	19 34 56.0 19 39 17.0	1 54.2 2 26.8	50.15 49.90	50.20 50.30	..... .....	304 44 49.32 55 14 25.98	+ 0.90 + 0.88	+ 6.46 - 10.68	- 1 21.30 + 1 21.32	-16 20 44.27
19	ϕ Cygni	E W	...	19 51 2.0 19 55 55.0	1 55.5 2 57.5	50.05 51.15	50.15 50.90	..... .....	346 43 53.40 13 15 38.05	+ 0.89 + 1.52	+ 15.13 - 35.71	- 13.34 + 13.34	+52 10 57.35
20	b^2 Cygni	W E	...	20 6 ..... .....	..... .....	50.90 48.10	50.60 49.80	26.725 26.725	357 36 25.25 2 20 12.82	+ 0.70 - 0.41	- 0.16 + 0.16	- 2.34 + 2.34	+36 33 21.06

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1904.0.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>	
15 19 27	44.3	46.1	29.684	5, 12, 16.	Instrument in meridian, observation at IX with movable thread.			1	359 59 36.89	+ 5.68
19 37	44.0	...	...	20.	Instrument in meridian, observation at VIII with movable thread.			2	35.82	...
19 49	44.1	...	...					3	36.66	...
20 6	44.1	...	...					4	36.41	...
20 29	44.1	45.8	29.694					5	37.00	...
10 26	60.9	...	...					6	36.62	...
10 41	60.6	61.2	29.714					7	37.23	...
10 59	59.7	...	...					8	36.50	- 4.79
11 9	59.1	...	...					9	37.72	...
10 20	58.6	...	...					10	38.42	...
11 38	58.0	60.8	29.723					11	37.76	+ 17.73
11 56	57.6	...	...					12	37.54	...
12 10	56.9	...	...	4.	Unsteady.			13	37.58	...
12 19	56.8	...	...	7, 8, 15.	Very faint.			14	38.16	...
12 32	56.9	59.1	29.726	16, 19, 20.	Clouds.			15	36.86	+ 11.06
18 19 28	55.1	...	...					16	37.11	- 1.73
19 38	55.2	57.1	29.506					17	35.40	+ 4.93
19 54	55.1	...	...					18	36.44	- 11.82
20 9	55.0	...	...					19	36.64	...
								20	35.74	+ 2.30

Notes.
4. Unsteady.
7, 8, 15. Very faint.
16, 19, 20. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Capricorni	E	...	20 14 12.0	1 13.4	50.75	51.30	...	53 58 29.42	+ 1.59	- 2.73	+ 17.68	- 15 4 52.51
		W	...	20 20 15.0	4 49.6	51.45	51.40	...	306 0 0.78	+ 1.86	+ 42.47	- 17.75	
2	ϵ Delphini	W	...	20 25 43.0	2 42.8	49.30	49.75	...	332 3 6.90	+ 0.48	+ 23.56	- 30.03	+ 10 58 40.67
	May 20, L.	E	...	20 30 14.0	1 48.2	49.05	50.15	...	27 55 52.90	+ 0.64	- 10.41	+ 30.03	
3	β Ursæ Majoris	W	...	10 53 17.0	2 43.5	49.40	48.30	...	17 58 14.05	+ 0.63	- 20.07	+ 18.07	+ 56 53 53.69
		E	...	10 58 30.0	2 29.5	49.75	48.70	...	342 0 59.22	+ 0.97	+ 16.78	- 18.08	
4	θ Leonis	E	2	11 6 33.5	2 36.4	51.85	49.40	...	22 57 42.75	+ 1.88	- 25.57	+ 23.65	+ 15 57 9.59
		W	...	11 11 35.5	2 25.6	52.75	49.10	...	337 1 27.88	+ 1.94	+ 22.16	- 23.66	
5	γ Crateris	W	...	11 17 16.0	2 47.2	49.65	48.25	...	303 55 47.72	+ 0.78	+ 13.66	- 1 22.80	- 17 9 40.23
		E	...	11 22 39.0	2 35.8	50.55	48.70	...	56 3 21.22	+ 1.19	- 11.86	+ 1 22.84	
6	ν Leonis	E	...	11 29 18.0	2 42.0	52.35	48.85	...	39 12 11.38	+ 1.64	- 17.62	+ 45.58	- 0 17 48.79
		W	...	11 35 1.0	3 1.0	52.00	48.55	...	320 46 51.98	+ 1.45	+ 21.09	- 45.61	
7	298 G. Hydræ	W	...	11 41 15.0	2 37.5	50.00	48.00	...	294 52 54.55	+ 0.67	+ 10.41	- 2 0.04	- 26 13 14.58
		E	...	11 46 39.0	2 46.5	51.10	48.90	...	65 6 18.50	+ 1.36	- 11.03	+ 2 0.10	
8	ι Virginis	E	...	12 2 3.0	2 41.3	52.70	48.95	...	36 28 24.08	+ 1.79	- 18.55	+ 41.42	+ 2 26 4.39
		W	...	12 7 23.0	2 38.7	52.75	49.00	...	323 30 45.58	+ 1.84	+ 17.96	- 41.43	
9	γ Virginis	W	...	12 12 7.5	2 50.4	50.50	48.25	...	320 56 35.22	+ 0.91	+ 19.56	- 45.46	- 0 8 10.21
		E	...	12 17 32.0	2 34.1	50.60	48.55	...	39 2 33.65	+ 1.08	- 15.99	+ 45.48	
10	δ Corvi	E	...	12 21 39.0	3 13.3	51.10	48.60	...	54 52 54.72	+ 1.24	- 18.63	+ 1 19.63	- 15 59 4.66
		W	...	12 25 24.0	0 31.7	52.55	49.05	...	305 6 31.38	+ 1.81	+ 0.50	- 1 19.63	
11	η Canum Venat.	E	...	12 34 ....	...	50.95	48.80	26.950	357 29 14.72	+ 2.06	+ 0.30	- 2.44	+ 41 24 12.43
		W	...	...	...	52.15	48.80	26.950	2 27 1.45	+ 2.35	- 0.30	+ 2.43	
12	31 Comæ Berenices	W	...	12 45 19.5	1 40.0	49.10	47.85	...	349 7 56.00	+ 0.44	+ 19.88	- 10.78	+ 28 3 46.37
		E	...	12 48 50.0	1 50.4	48.45	47.80	...	10 51 19.60	+ 0.22	- 24.23	+ 10.79	
13	ϵ Virginis	E	...	12 54 37.0	2 45.3	51.10	48.80	...	27 26 21.75	+ 1.31	- 24.65	+ 29.19	+ 11 28 25.92
		W	...	13 0 3.5	2 41.2	51.50	48.65	...	332 32 50.25	+ 1.37	+ 23.44	- 29.20	
14	43 Comæ Berenices	W	...	13 4 58.0	2 24.0	49.45	47.95	...	349 25 41.35	+ 0.57	+ 42.25	- 10.49	+ 28 21 53.09
		E	...	13 10 8.0	2 46.0	49.40	48.05	...	10 33 46.08	+ 0.60	- 56.12	+ 10.51	
15	51 Ursæ Majoris	E	...	13 17 22.5	2 39.6	50.80	48.30	...	343 29 6.98	+ 1.04	+ 21.58	- 16.75	+ 55 25 40.33
		W	...	13 22 50.5	2 48.4	51.55	48.70	...	16 30 5.70	+ 1.48	- 24.03	+ 16.78	
16	25 Canum Venat.	E	...	13 33 ....	...	50.05	48.35	26.695	2 6 31.68	+ 1.57	+ 0.25	+ 2.11	+ 36 47 1.17
		W	...	...	...	52.00	48.70	26.695	357 50 4.40	+ 2.32	- 0.25	- 2.11	
17	89 Virginis	W	...	13 41 55.0	2 43.2	49.25	48.15	...	303 26 1.65	+ 0.64	+ 12.90	- 1 25.24	- 17 39 30.39
		E	...	13 47 24.0	2 45.8	48.65	48.25	...	56 33 11.90	+ 0.49	- 13.32	+ 1 25.24	
18	ι Boötis	E	...	13 54 29.0	2 18.8	51.90	48.70	...	11 4 16.50	+ 1.46	- 37.64	+ 11.07	+ 27 51 0.98
		W	...	13 59 29.0	2 41.2	53.40	49.00	...	348 54 38.10	+ 2.01	+ 50.73	- 11.07	
19	ϵ Virginis	W	...	14 4 57.0	2 48.3	50.20	48.40	...	311 15 25.58	+ 0.95	+ 15.75	- 1 4.31	- 9 49 42.74
		E	...	14 10 28.0	2 42.7	48.85	48.05	...	48 43 46.95	+ 0.47	- 14.72	+ 1 4.33	
20	3 G. Libræ	E	...	14 16 33.0	2 46.1	50.80	48.80	...	63 15 33.80	+ 1.31	- 12.14	+ 1 51.71	- 24 22 21.15
		W	...	14 22 5.0	2 45.9	52.95	49.20	...	296 43 36.38	+ 2.04	+ 12.11	- 1 51.74	

Time	Ther- 1822	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>			<i>in</i>							
12 20 2	54.7		29.513	11.16 Instrument in meridian, observation at I with movable thread				1	359 59 36.66	
12 20 22	54.5	66.4	29.513					2	37.04	
12 20 27	54.6	66.9	29.513					3	35.78	
12 20 30	54.6		29.513					4	35.52	
12 20 33	54.2		29.513					5	36.38	+ 17.78
12 20 36	54.6		29.513					6	35.40	
12 20 44	54.9	63.9	29.513					7	36.96	+ 19.10
12 20 51	54.9		29.513					8	36.44	+ 9.86
12 20 55	54.2		29.513					9	37.22	
12 20 58	50.1	63.2	29.513					10	35.61	
12 21 0	60.0		29.513					11	36.04	+ 2.13
12 21 07	60.0		29.513					12	35.96	
12 21 15	60.0		29.513					13	36.24	
12 21 20	60.8		29.513					14	37.38	
12 21 26	60.6	61.3	29.513					15	36.19	
12 21 27	60.6		29.513					16	35.32	
12 21 30	60.9		29.513					17	37.13	
12 21 32	60.6		29.513					18	35.68	
12 21 39	60.6		29.513					19	37.50	
								20	36.74	+ 7.54

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	6 B. Libræ	W	...	14 29 35.0	2 17.3	50.45	48.40	.....	309 11 22.48	+ 1.01	+10.10	-1 9.26	-11 53 55.25
		E	...	14 35 8.0	3 15.7	49.60	48.65	.....	50 47 58.68	+ 0.97	-20.52	+1 9.28	
	May 21, L.												
2	α Ursæ Majoris	E	...	10 55 13.0	2 33.1	53.40	49.55	.....	336 38 46.68	+ 2.30	+11.68	- 23.99	+62 16 16.16
		W	...	11 0 3.0	2 16.9	50.95	48.30	.....	23 20 19.72	+ 1.03	- 9.34	+ 24.00	
3	δ Leonis	W	...	11 6 18.5	2 39.8	48.85	47.60	.....	342 6 57.08	+ 0.19	+32.95	- 17.94	+21 2 53.73
		E	...	11 11 34.3	2 36.0	50.25	48.35	.....	17 52 11.88	+ 0.87	-31.40	+ 17.94	
4	ε Leonis	E	2.5	11 16 18.0	2 35.4	52.25	49.00	.....	27 51 21.88	+ 1.75	-21.52	+ 29.41	+11 3 20.95
		W	...	11 21 32.5	2 39.1	50.50	48.45	.....	332 7 45.62	+ 1.07	+22.56	- 29.42	
5	ν Leonis	W	...	11 29 11.5	2 48.8	48.55	47.75	.....	320 46 57.85	+ 0.19	+19.12	- 45.43	- 0 17 48.18
		E	...	11 34 48.0	2 47.7	50.50	48.40	.....	39 12 14.15	+ 0.96	-18.88	+ 45.44	
6	298 G. Hydræ	E	...	11 41 11.0	2 41.8	51.20	48.75	.....	65 6 18.08	+ 1.32	-10.98	+1 59.52	-26 13 15.05
		W	...	11 46 39.0	2 46.2	50.55	48.55	.....	294 52 51.15	+ 1.09	+11.59	-1 59.56	
7	10 Virginis	W	...	12 2 29.0	2 15.6	48.25	47.80	.....	323 30 51.68	+ 0.14	+13.11	- 41.25	+ 2 26 3.79
		E	...	12 7 20.0	2 35.4	49.70	48.50	.....	36 28 24.80	+ 0.82	-17.22	+ 41.27	
8	η Virginis	E	...	12 12 10.5	2 47.7	50.95	49.00	.....	39 2 34.22	+ 1.39	-18.94	+ 45.29	- 0 8 9.37
		W	...	12 17 35.0	2 36.8	51.10	48.25	.....	320 56 37.35	+ 1.05	+16.56	- 45.32	
9	20 Comæ Berenices	W	...	12 22 3.3	2 49.0	48.90	.....	.....	342 29 36.02	+ 0.29	+37.52	- 17.65	+21 25 37.01
		E	...	12 27 19.5	2 27.2	50.25	.....	.....	17 29 25.60	+ 0.94	-28.46	+ 17.66	
10	ρ Virginis	E	...	12 34 18.3	2 41.8	52.10	48.95	.....	28 8 56.38	+ 1.67	-23.13	+ 29.99	+10 45 47.75
		W	...	12 39 34.0	2 33.9	52.05	48.75	.....	331 50 14.30	+ 1.64	+20.92	- 30.02	
11	31 Comæ Berenices	E	...	12 44 37.0	2 22.8	52.10	49.55	.....	10 51 35.10	+ 2.01	-40.52	+ 10.78	+28 3 45.51
		W	...	12 49 30.0	2 30.2	52.05	48.85	.....	349 7 29.15	+ 1.64	+44.82	- 10.79	
12	ε Virginis	W	...	12 54 47.5	2 35.0	48.95	47.65	.....	332 32 55.45	+ 0.24	+21.68	- 29.19	+11 28 26.81
		E	...	13 0 6.0	2 43.5	50.30	48.85	.....	27 26 21.90	+ 1.15	-24.12	+ 29.21	
13	43 Comæ Berenices	E	...	13 4 44.5	2 37.6	51.95	49.25	.....	10 33 37.98	+ 1.83	-50.59	+ 10.50	+28 21 53.24
		W	...	13 9 55.5	2 33.4	51.75	48.70	.....	349 25 33.68	+ 1.50	+47.94	- 10.50	
14	ζ ¹ Ursæ Majoris	W	...	13 17 47.0	2 15.2	49.90	48.55	.....	16 29 57.28	+ 0.99	-15.49	+ 16.69	+55 25 40.08
		E	...	13 22 38.5	2 36.3	49.75	48.35	.....	343 29 8.08	+ 0.80	+20.70	- 16.69	
15	17 H. Canum Venat.	E	...	13 30 ....	.....	50.50	48.70	27.660	1 12 27.90	+ 1.86	+ 0.26	+ 1.23	+37 40 28.54
		W	...	.....	.....	51.55	48.60	27.660	358 42 54.15	+ 2.09	- 0.26	- 1.23	
	May 22, L.												
16	δ Sagittæ	E	...	19 40 43.0	2 22.4	49.90	47.85	.....	20 37 0.28	+ 1.19	-23.20	+ 21.24	+18 17 53.03
		W	...	19 45 30.3	2 24.9	54.10	49.70	.....	339 22 6.00	+ 3.20	+24.02	- 21.24	
17	φ Cygni	W	...	19 50 28.3	2 39.9	53.90	49.65	.....	13 15 30.15	+ 3.10	-28.99	+ 13.30	+52 10 57.87
		E	...	19 55 32.0	2 23.8	48.70	47.90	.....	346 43 44.32	+ 0.94	+23.45	- 13.30	
18	b ² Cygni	E	...	20 6 ....	.....	48.95	47.75	26.275	2 20 30.05	+ 1.17	+ 0.04	+ 2.33	+36 33 22.61
		W	...	.....	.....	53.65	49.40	.....	357 37 42.32	+ 3.80	- 0.37	- 2.33	
19	β Capricorni	W	...	20 13 23.0	2 13.0	51.70	48.50	.....	306 0 34.52	+ 1.94	+ 8.96	-1 17.52	-15 4 52.37
		E	...	20 17 20.0	1 44.0	47.65	47.35	.....	53 58 33.82	+ 0.36	- 5.48	+1 17.52	
20	41 Cygni	E	...	20 25 ....	.....	48.35	47.55	26.995	8 50 24.30	+ 1.21	+ 0.12	+ 8.82	+30 2 51.83
		W	...	.....	.....	53.40	49.35	.....	351 7 17.68	+ 3.40	- 0.12	- 8.82	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
20 14 32	57.3	59.8	29.639	15. Instrument in meridian, observation at I with movable thread.	1	389 59 36.37	+ 5.11
21 10 59	68.0	70.1	29.775	18. Instrument in meridian; E. observation at III with movable thread; W. observation at I + 5° with fixed thread.	2	36.04	.....
11 9	67.9	.....	.....		3	36.24	.....
11 19	67.4	.....	.....	20. Instrument in meridian; E. observation at II with movable thread; W. observation at II with fixed thread.	4	35.68	+ 8.57
11 32	66.9	.....	.....		5	36.70	.....
11 44	66.7	68.3	29.776		6	36.10	+19.12
12 5	66.0	.....	.....		7	36.68	+ 9.79
12 16	65.6	.....	.....		8	35.80	.....
12 25	64.6	.....	.....		9	35.90	.....
12 38	63.9	.....	.....		10	35.88	.....
12 47	63.2	.....	.....	Notes.	11	36.10	.....
12 58	62.3	.....	.....	4 E. One microscope reading increased 10"; W. one microscope reading increased 20".	12	38.16	.....
13 7	62.2	.....	.....	7. Very faint.	13	36.17	.....
13 21	62.0	64.7	29.793	9. Lower level correction assumed.	14	36.18	.....
13 32	61.9	.....	.....	16, 17, 18. Clouds.	15	37.75	.....
22 19 43	60.9	63.0	29.778		16	35.74	.....
19 53	60.8	.....	.....		17	36.48	.....
20 15	60.3	.....	.....		18	37.60	+ 1.58
					19	37.00	.....
					20	37.10	+ 0.61

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	α Delphini	W	3	20 32 24.3	2 45.2	51.65	48.60	.....	336 38 40.70	+ 1.98	+28.14	- 24.39	+15 34 25.85
	May 23, L.	E		20 37 26.5	2 17.0	47.40	47.40	.....	23 20 22.95	+ 0.32	-19.36	+ 24.39	
2	α Ursæ Majoris	W	...	10 55 17.5	2 29.0	48.80	48.35	.....	23 20 22.52	+ 1.02	-11.06	+ 23.43	+62 16 16.89
		E	...	11 0 19.0	2 32.5	48.95	49.10	.....	336 38 46.10	+ 1.45	+11.59	- 23.44	
3	δ Leonis	E	...	11 6 15.0	2 43.7	50.65	49.00	.....	17 52 14.28	+ 1.79	-34.57	+ 17.53	+21 2 53.91
		W	...	11 11 48.5	2 49.8	50.35	48.80	.....	342 6 51.98	+ 1.04	+37.20	- 17.54	
4	ϵ Leonis	W	...	11 16 16.5	2 37.3	46.90	47.95	.....	332 7 48.72	+ 0.42	+22.05	- 28.75	+11 3 21.18
		E	...	11 21 44.5	2 50.7	48.60	49.25	.....	27 51 29.38	+ 1.48	-25.97	+ 28.77	
5	ϵ Hydræ	E	...	11 25 41.0	2 34.9	50.60	49.80	.....	70 12 27.98	+ 2.19	- 9.24	+2 30.01	-31 19 56.47
		W	...	11 30 48.0	2 32.1	49.65	48.60	.....	289 46 44.25	+ 1.37	+ 8.91	-2 30.11	
6	β Leonis	W	...	11 41 28.0	2 40.5	47.00	48.60	.....	336 10 45.18	+ 0.71	+26.13	- 24.07	+15 6 26.11
		E	...	11 46 40.0	2 31.5	47.45	49.20	.....	23 48 27.40	+ 1.11	-23.29	+ 24.09	
7	ϵ Corvi	E	...	12 2 27.0	2 43.4	50.65	49.45	.....	60 58 50.85	+ 2.05	-12.00	+1 38.24	-22 5 24.62
		W	...	12 8 16.0	3 5.6	50.55	49.30	.....	299 0 17.12	+ 2.02	+15.48	-1 38.30	
8	ϵ Virginis	W	...	12 12 46.0	2 41.4	48.55	48.75	.....	324 55 21.72	+ 1.21	+19.19	- 38.40	+ 3 50 41.41
		E	...	12 17 55.0	2 27.6	48.40	49.35	.....	35 3 50.60	+ 1.50	-16.05	+ 38.43	
9	20 Comæ Berenices	E	...	12 22 9.0	2 43.8	50.10	49.50	.....	17 29 31.45	+ 1.97	-35.25	+ 17.28	+21 25 37.17
		W	...	12 27 39.0	2 46.2	50.80	49.30	.....	342 29 35.15	+ 2.05	+36.29	- 17.29	
10	ρ Virginis	W	...	12 34 10.5	2 50.1	48.20	48.40	.....	331 50 11.85	+ 0.98	+25.56	- 29.37	+10 45 47.67
		E	...	12 39 49.0	2 48.4	48.50	49.00	.....	28 9 1.62	+ 1.30	-25.05	+ 29.38	
11	ϕ Virginis	E	...	12 46 52.0	2 28.9	49.95	49.10	.....	47 55 17.35	+ 1.73	-12.51	+1 0.77	- 9 1 13.72
		W	...	12 51 57.0	2 36.1	50.65	49.10	.....	312 3 51.45	+ 1.93	+13.75	-1 0.80	
12	14 Canum Venat.	W	...	13 1 ....	.....	48.75	48.65	25.980	357 22 25.52	+ 0.43	- 0.24	- 2.50	+36 18 47.41
		E	...	13 1 ....	.....	48.05	48.70	25.980	2 35 18.90	+ 0.32	+ 0.24	+ 2.51	
13	23 Canum Venat.	E	...	13 16 ....	.....	49.15	48.55	26.545	358 14 25.45	+ 1.94	+ 0.29	- 1.67	+40 39 18.91
		W	...	13 16 ....	.....	50.85	49.05	26.545	1 42 26.25	+ 2.61	- 0.29	+ 1.67	
14	17 H. Canum Venat.	W	...	13 30 ....	.....	49.00	48.70	25.470	358 44 26.62	+ 0.51	- 0.26	- 1.20	+37 40 28.51
		E	...	13 30 ....	.....	47.15	48.20	25.470	1 14 0.68	- 0.12	+ 0.26	+ 1.20	
15	89 Virginis	E	...	13 42 12.0	2 26.9	49.10	48.70	.....	56 33 11.20	+ 1.30	-10.45	+1 23.32	-17 39 30.63
		W	...	13 47 12.0	2 33.1	50.30	49.00	.....	303 26 0.72	+ 1.79	+11.36	-1 23.34	
16	11 Boötis	W	2	13 54 6.3	2 42.2	47.65	47.95	.....	348 54 41.32	+ 0.56	+51.37	- 10.81	+27 51 1.19
		E	...	13 59 30.3	2 41.8	47.55	48.50	.....	11 4 33.15	+ 0.79	-51.12	+ 10.82	
17	κ Virginis	E	...	14 5 6.5	2 39.5	48.95	48.70	.....	48 43 48.20	+ 1.30	-14.15	+1 2.88	- 9 49 43.69
		W	...	14 10 22.0	2 36.0	51.40	49.45	.....	311 15 24.38	+ 2.27	+13.53	-1 2.91	
18	3 G. Libræ	W	...	14 16 42.0	2 37.7	48.55	48.30	.....	296 43 35.92	+ 0.99	+10.76	-1 49.24	-24 22 22.79
		E	...	14 22 0.0	2 40.3	46.85	48.35	.....	63 15 38.85	+ 0.61	-11.12	+1 49.25	
19	6 B. Libræ	E	...	14 29 4.5	2 48.5	48.45	48.45	.....	50 47 55.25	+ 1.07	-15.21	+1 7.70	-11 53 54.61
	May 24, L.	W	...	14 34 40.0	2 47.0	50.55	49.00	.....	309 11 16.98	+ 1.82	+14.94	-1 7.72	
20	ϵ Sagittarii	E	2	19 34 18.0	2 43.3	49.20	48.90	.....	55 14 30.12	+ 1.40	-13.21	+1 10.96	-16 20 43.70
		W	...	19 39 52.0	2 50.7	50.20	48.70	.....	304 44 41.28	+ 1.55	+14.44	-1 20.00	

Time.	Ther- m.	Atm. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>			<i>in</i>							
22 20 36	69.1	62.3	29.782	12.14. Instrument in meridian, observation at IX with movable thread.				1	359 59 37.36	
23 16 58	70.1	81.2	29.742	13. Instrument in meridian, observation at I with movable thread.				2	35.80	
11 9	78.6							3	36.16	
11 20	78.2							4	38.05	+ 8.47
11 29	77.8	79.0	29.719					5	37.68	
11 45	76.8							6	38.63	
12 6	76.5							7	37.23	
12 16	75.4							8	39.10	+ 8.23
12 25	74.8							9	35.82	
12 37	73.8	75.8	29.744					10	38.14	
12 50	71.4							11	36.84	+ 10.82
13 12	72.6							12	38.74	+ 9.1
13 15	71.6	74.3	29.751					13	37.14	+ 1.14
13 45	71.5							14	39.26	
13 57	71.2							15	37.95	
14 8	70.9							16	38.04	
14 29	70.6							17	37.75	
14 32	70.1	79.7	29.752					18	38.31	+ 7.70
24 19 37	69.5	72.0	29.869					19	37.42	+ 5.06
								20	37.77	+ 12.22

Note.

19. W One microscope reading decreased 10

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	166 B. Camelop. s. p.	W E	2 2	19 45 52.0 19 51 20.0	2 47.0 2 41.0	49.05 48.10	49.00 48.15	..... .....	66 51 33.30 293 7 39.10	+ 1.46 + 0.81	+ 3.51 - 3.26	+2 9.43 -2 9.47	+74 10 32.94
2	4 B. Ursæ Minoris s. p.	E W	2 ...	19 58 36.0 20 3 56.0	3 7.2 2 12.8	47.25 50.55	47.80 49.40	..... .....	307 51 31.58 52 7 42.12	+ 0.42 + 2.04	- 0.35 + 0.18	-1 11.52 +1 11.56	+88 55 25.32
3	α ² Capricorni	W E	... ...	20 11 14.0 20 16 43.0	1 29.1 3 59.9	49.35 47.60	48.85 48.25	..... .....	308 15 17.60 51 44 35.60	+ 1.45 + 0.68	+ 4.18 -30.31	-1 10.52 +1 10.53	-12 20 20.10
4	41 Cygni	W E	2 ...	20 25 ..... .....	..... .....	51.05 47.10	49.35 48.05	26.173 26.173	351 6 27.10 8 51 0.12	+ 1.35 - 0.25	- 0.19 + 0.19	- 8.70 + 8.70	+30 2 52.20
5	α Delphini	E W	2 ...	20 32 17.0 20 37 37.0	2 53.1 2 26.9	48.45 51.90	48.45 49.75	..... .....	23 20 33.48 336 38 47.30	+ 0.90 + 2.51	-30.90 +22.26	+ 24.04 - 24.05	+15 34 27.00
6	ν Cygni	W E	2 ...	20 54 ..... .....	..... .....	49.85 46.70	49.25 47.65	27.397 27.397	1 50 21.78 358 5 27.10	+ 1.00 - 0.53	- 0.29 + 0.29	+ 1.83 - 1.83	+40 47 46.44
7	May 27, L. Ursæ Majoris	E W	... ...	11 13 ..... .....	..... .....	55.35 58.05	52.35 52.95	26.877 26.877	5 16 16.38 354 40 3.15	+ 4.50 + 5.58	+ 0.22 - 0.22	+ 5.16 - 5.16	+33 37 5.34
8	β Leonis	E W	... ...	11 43 23.0 11 47 28.5	0 46.2 3 19.3	54.45 58.55	51.35 53.00	..... .....	23 48 2.35 336 10 26.72	+ 3.15 + 4.90	- 2.17 +40.28	+ 24.59 - 24.62	+15 6 26.48
9	c Virginis	E W	... ...	12 12 40.0 12 18 12.5	2 48.0 2 44.5	48.75 55.95	50.10 52.55	..... .....	35 3 55.58 324 55 18.78	+ 1.10 + 4.08	-20.80 +19.94	+ 39.24 - 39.26	+ 3 50 41.01
10	74 Ursæ Majoris	W E	... ...	12 23 22.0 12 27 15.0	2 5.7 1 47.3	53.15 47.15	51.55 49.30	..... .....	20 0 18.40 339 58 58.98	+ 2.83 + 0.25	-10.11 + 7.37	+ 20.38 - 20.38	+58 56 9.44
11	76 Ursæ Majoris	E W	... ...	12 34 46.0 12 39 48.0	2 35.6 2 26.4	51.75 56.45	50.65 52.30	..... .....	335 40 35.02 24 18 33.55	+ 2.05 + 4.03	+11.23 - 9.94	- 25.30 + 25.32	+63 14 31.78
12	φ Virginis	W E	... ...	12 46 49.0 12 51 40.0	2 32.5 2 18.5	53.75 47.55	51.70 49.65	..... .....	312 3 54.98 47 55 16.22	+ 3.15 + 0.55	+13.13 -10.83	-1 2.06 +1 2.07	- 9 1 12.60
13	14 Canum Venat.	E W	... ...	13 1 ..... .....	..... .....	51.75 55.85	51.00 52.15	27.136 27.136	2 34 28.30 357 21 32.60	+ 2.94 + 4.60	+ 0.24 - 0.24	+ 2.56 - 2.56	+36 18 46.98
14	23 Canum Venat.	W E	... ...	13 16 ..... .....	..... .....	53.30 47.00	51.40 49.30	26.443 26.443	1 42 34.00 358 14 33.28	+ 2.06 - 0.55	- 0.29 + 0.29	+ 1.70 - 1.70	+40 39 19.88
15	350 G. Hydræ	E W	... ...	13 24 38.0 13 30 17.0	2 37.4 3 1.6	51.05 56.90	50.50 52.70	..... .....	67 4 58.82 292 54 10.10	+ 1.81 + 4.45	-10.05 +13.38	+2 12.04 -2 12.08	-28 12 6.58
16	τ Boëtis	W E	... ...	13 40 12.0 13 45 20.0	2 29.9 2 38.1	52.25 50.60	50.75 50.15	..... .....	339 9 22.40 20 58 56.40	+ 2.20 + 1.53	+25.33 -28.17	- 21.58 + 21.59	+17 56 5.30
17	τ Virginis	E W	... ...	13 54 30.0 13 59 29.0	2 15.7 2 43.3	52.45 56.50	50.95 52.40	..... .....	36 53 55.85 323 5 9.75	+ 2.45 + 4.14	-13.00 +18.83	+ 42.25 - 42.25	+ 2 0 28.26
18	ε Virginis	W E	... ...	14 7 59.0 14 13 37.0	3 0.0 2 38.0	53.75 49.40	51.35 49.85	..... .....	315 32 17.35 44 26 53.42	+ 2.87 + 1.00	+19.53 -15.05	- 55.20 + 55.21	- 5 32 38.26
19	f Boëtis	E W	... ...	14 19 14.5 14 24 21.5	2 44.9 2 22.1	51.20 55.80	50.25 52.15	..... .....	19 15 36.82 340 43 43.38	+ 1.77 + 3.87	-32.93 +24.46	+ 19.70 - 19.70	+19 39 30.12
20	33 Boëtis	W E	3.5 ...	14 35 ..... .....	..... .....	53.10 47.60	51.05 49.00	26.267 26.267	5 52 30.20 354 4 52.20	+ 1.84 - 0.53	- 0.34 + 0.34	+ 5.83 - 5.83	+44 49 12.48

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>			<i>in.</i>			<i>° ' "</i>	
24 19 49	69.1			4. 6. 14. 20. Instrument in meridian, observation at IX with movable thread.	1	359 59 37.44	
20 7	68.5			7. 13. Instrument in meridian, observation at I with movable thread.	2	38.02	
20 14	68.9				3	39.60	
20 36	68.7				4	39.19	+ 0.21
20 50	68.1	70.3	29.881		5	37.82	
27 11 14	68.6	71.4	29.798		6	38.08	
11 51	66.9				7	37.58	
12 16	65.6	67.4	29.808		8	37.60	
12 31	65.2				9	39.31	+ 8.35
12 38	64.9				10	38.86	- 7.70
12 50	64.2				11	37.98	
13 20	64.0				12	38.60	+10.59
13 28	61.9			Notes.	13	37.57	- 2.71
13 43	61.2			3. Paint; clouds.	14	39.44	- 4.03
13 58	61.0			8 E. One microscope reading increased 10".	15	39.24	+12.67
14 12	62.9			12, 15. Unsteady.	16	39.85	
14 23	62.5	64.4	29.845		17	39.01	
					18	39.61	
					19	38.68	
					20	39.72	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	8 Libræ	E	...	14 42 47.0	2 36.0	49.85	49.90	.....	54 29 44.48	+ 1.27	-12.22	+1 18.92	-15 35 57.28
		W	...	14 48 8.0	2 45.0	56.90	52.50	.....	305 29 25.25	+ 4.31	+13.66	-1 18.94	
2	δ Libræ	W	...	14 53 9.0	2 41.9	53.95	51.45	.....	312 56 44.58	+ 3.00	+15.04	-1 0.55	- 8 8 19.98
	May 28, L.	E	...	14 58 29.0	2 38.1	48.00	49.45	.....	47 2 28.88	+ 0.51	-14.34	+1 0.58	
3	ν Ursæ Majoris	W	...	11 13 ....	.....	50.05	49.55	26.550	354 40 23.68	+ 1.07	- 0.22	- 5.15	+33 37 5.20
		E	...	.....	.....	51.95	51.50	26.550	5 16 34.68	+ 2.54	+ 0.22	+ 5.15	
4	τ Ursæ Majoris	E	...	11 46 5.0	2 41.3	50.00	50.10	.....	344 40 56.75	+ 2.08	+24.44	- 15.25	+54 13 48.15
		W	...	11 51 24.0	2 37.7	50.10	49.60	.....	15 18 16.98	+ 1.83	-23.36	+ 15.27	
5	10 Virginis	W	...	12 2 3.0	2 42.9	46.30	48.35	.....	323 30 49.28	+ 0.29	+18.92	- 41.25	+ 2 26 4.70
		E	...	12 7 30.0	2 44.1	48.50	50.00	.....	36 28 27.72	+ 1.64	-19.20	+ 41.29	
6	12 Comæ Berenices	E	...	12 15 40.5	2 0.0	51.60	51.00	.....	12 32 22.30	+ 2.92	-25.21	+ 12.44	+26 22 41.83
		W	...	12 19 36.0	1 55.5	52.60	50.95	.....	347 26 48.45	+ 3.16	+23.35	- 12.45	
7	74 Ursæ Majoris	E	...	12 23 51.0	1 36.9	49.50	50.15	.....	339 58 58.90	+ 1.99	+ 6.01	- 20.37	+58 56 9.27
		W	...	12 28 59.0	3 31.1	51.10	50.20	.....	20 0 37.20	+ 2.39	-28.50	+ 20.38	
8	76 Ursæ Majoris	W	...	12 35 8.0	2 13.8	49.05	49.45	.....	24 18 35.02	+ 1.52	- 8.30	+ 25.29	+63 14 31.78
		E	...	12 40 11.0	2 49.2	48.90	49.65	.....	335 40 34.02	+ 1.58	+13.28	- 25.30	
9	δ Virginis	E	...	12 48 15.0	2 31.0	50.65	50.55	.....	34 59 28.18	+ 2.49	-16.83	+ 39.22	+ 3 55 2.19
		W	...	12 53 8.0	2 22.0	51.95	50.45	.....	324 59 45.40	+ 2.79	+14.88	- 39.23	
10	γ Hydræ	E	3	13 11 2.0	2 40.6	51.00	50.45	.....	61 33 27.05	+ 2.53	-11.48	+1 43.24	-22 40 5.96
		W	...	13 16 9.0	2 26.4	52.40	50.65	.....	298 25 46.55	+ 3.00	+ 9.54	-1 43.28	
11	350 G. Hydræ	W	...	13 25 24.0	1 51.6	48.95	49.35	.....	292 54 21.92	+ 1.43	+ 5.06	-2 12.15	-28 12 5.66
		E	...	13 30 1.0	2 45.4	48.10	49.30	.....	67 4 58.85	+ 1.21	-11.10	+2 12.23	
12	τ Boötis	E	...	13 40 2.0	2 40.1	51.65	50.50	.....	20 58 54.70	+ 2.70	-28.89	+ 21.60	+17 56 6.02
		W	...	13 45 23.0	2 40.9	53.95	51.15	.....	339 0 17.42	+ 3.56	+29.18	- 21.61	
13	τ Virginis	W	...	13 54 1.0	2 44.9	50.20	49.45	.....	323 5 14.02	+ 1.82	+19.20	- 42.30	+ 2 0 28.99
		E	...	13 59 27.0	2 41.1	49.50	49.85	.....	36 54 2.48	+ 1.89	-18.33	+ 42.32	
14	ε Virginis	E	...	14 8 17.0	2 42.2	51.55	50.05	.....	44 26 50.70	+ 2.45	-15.86	+ 55.28	- 5 32 36.87
		W	...	14 13 36.5	2 37.3	53.50	50.85	.....	315 32 22.28	+ 3.31	+14.92	- 55.28	
15	f Boötis	W	...	14 19 10.3	2 49.3	50.80	49.50	.....	340 43 36.58	+ 2.02	+34.71	- 19.72	+19 39 31.18
	June 3, L.	E	...	14 24 38.0	2 38.4	49.20	49.40	.....	19 15 33.92	+ 1.56	-30.38	+ 19.73	
16	17 Canum Venat.	E	...	13 6 ....	.....	53.80	50.75	27.430	359 52 29.75	+ 4.32	+ 0.27	- 0.09	+39 0 35.61
		W	...	.....	.....	52.20	49.75	27.430	0 3 8.58	+ 3.45	- 0.27	+ 0.08	
17	α Virginis	W	...	13 17 19.0	2 50.3	48.55	48.00	.....	310 25 24.55	+ 0.95	+15.88	-1 4.80	-10 39 44.65
		E	...	13 22 44.5	2 35.2	50.10	48.90	.....	49 33 46.05	+ 1.80	-13.19	+1 4.83	
18	m Virginis	E	...	13 34 4.0	2 31.6	53.55	50.85	.....	47 7 16.05	+ 3.61	-13.18	+ 59.65	- 8 13 12.69
		W	...	13 39 23.5	2 47.9	.....	.....	.....	312 51 47.88	+ 2.78	+16.17	- 59.69	
19	92 Virginis	W	...	13 48 57.0	2 38.7	48.15	47.85	.....	322 35 53.40	+ 0.81	+17.59	- 42.37	+ 1 31 8.57
		E	...	13 54 16.0	2 40.3	49.35	49.20	.....	37 23 19.75	+ 1.74	-17.95	+ 42.37	
20	9 H. Boötis	E	...	14 4 ....	.....	51.95	49.65	27.347	354 34 28.20	+ 3.31	+ 0.33	- 5.24	+44 18 45.49
		W	...	.....	.....	51.15	48.65	27.347	5 21 16.40	+ 2.65	- 0.33	+ 5.24	

Time	Ther. 1882	Att ther	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1904.0.
<i>f h m</i>			<i>in</i>				
27 14 46	62.0			3 Instrument in meridian, observation at IX with movable thread.	1	359 59 38.36	
28 14 57	61.9	64.4	29.856	16.20 Instrument in meridian, observation at I with movable thread.	2	38.85	+ 7.74
28 15 15	71.5	74.2	29.945		3	40.40	
28 15 40	69.6				4	39.37	
28 16 6	68.6				5	39.34	+ 9.18
28 28	62.5	69.8	29.942		6	37.48	
29 19	67.1				7	39.00	- 7.82
29 52	66.8				8	38.56	
31 14	66.2				9	38.45	
31 25	65.1	68.2	29.951		10	38.58	
31 44	64.5			Notes.	11	38.72	+ 12.72
31 57	64.2			3.5-7 Unsteady	12	39.13	
34 11	61.9			4 Diffuse	13	40.55	
34 23	61.2	66.2	29.966	17 Cloudy	14	38.90	
3 13 4	72.4			18 W Level correction assumed.	15	39.21	
3 13 11		73.2	29.847		16	38.40	- 4.53
3 13 21	72.0				17	38.04	
3 13 37	70.5				18	36.64	
3 13 52	70.8	72.9	29.846		19	37.67	+ 4.09
					20	37.25	- 6.60

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Boötis	W	...	14 11 27.0	1 20.1	48.65	47.60	...	12 52 56.62	+ 0.76	- 7.55	+ 12.71	+ 51 48 42.79
		E	...	14 15 26.0	2 38.9	49.05	48.15	...	347 5 52.45	+ 1.18	+ 29.68	- 12.72	
2	204 B. Boötis	E	...	14 26 ....	...	49.50	48.80	27.541	356 39 14.08	+ 2.31	+ 0.30	- 3.21	+ 42 13 50.23
		W	...	...	...	49.75	49.00	27.541	3 16 15.00	+ 2.42	- 0.30	+ 3.21	
3	33 Boötis	E	...	14 35 ....	...	48.85	48.35	26.803	354 4 23.70	+ 1.89	+ 0.34	- 5.74	+ 44 49 13.83
		W	...	...	...	49.75	48.95	26.803	5 52 6.35	+ 2.49	- 0.34	+ 5.74	
4	8 Libræ	W	...	14 42 42.0	2 42.3	47.55	47.40	...	305 29 27.35	+ 0.41	+ 13.22	- 1 17.80	- 15 35 56.97
		E	...	14 48 22.0	2 57.7	47.70	47.95	...	54 29 48.02	+ 0.74	- 15.85	+ 1 17.82	
5	δ Libræ	E	...	14 53 58.0	1 54.2	50.40	49.00	...	47 2 19.45	+ 1.86	- 7.48	+ 59.68	- 8 8 19.56
		W	...	14 58 26.0	2 33.8	50.25	48.60	...	312 56 45.25	+ 1.65	+ 13.57	- 59.70	
6	ε Libræ	W	...	15 4 13.0	2 33.8	48.80	47.70	...	301 39 51.45	+ 0.89	+ 11.12	- 1 29.97	- 19 25 46.25
		E	...	15 9 41.0	2 54.2	49.00	48.60	...	58 19 22.52	+ 1.37	- 14.27	+ 1 29.99	
7	τ¹ Serpentis	E	...	15 19 13.0	2 8.7	50.35	49.25	...	23 8 46.12	+ 2.00	- 17.20	+ 23.81	+ 15 45 58.41
		W	...	15 24 6.5	2 44.8	50.95	48.95	...	336 50 11.48	+ 2.06	+ 28.20	- 23.82	
8	φ Boötis	W	2	15 34 ....	...	49.05	48.35	26.528	1 43 14.02	+ 0.52	- 0.29	+ 1.70	+ 40 40 3.23
		E	...	...	...	49.05	48.50	26.528	358 13 43.95	+ 0.43	+ 0.43	- 1.70	
9	κ Serpentis	E	...	15 41 42.5	2 44.1	50.00	48.60	...	20 28 40.68	+ 1.57	- 30.97	+ 20.83	+ 18 26 20.86
		W	...	15 47 5.5	2 38.9	50.10	48.20	...	339 30 30.60	+ 1.39	+ 29.05	- 20.83	
10	49 Libræ	W	...	15 53 57.0	1 1.3	47.20	47.55	...	304 50 36.75	+ 0.36	+ 1.86	- 1 19.87	- 16 15 1.53
		E	...	15 57 31.0	2 32.7	...	...	...	55 8 47.00	+ 0.49	- 11.57	+ 1 19.87	
11	α¹ Scorpii	E	...	16 3 48.0	2 37.6	49.05	48.70	...	66 33 32.38	+ 1.43	- 10.17	+ 2 7.88	- 27 40 37.88
		W	...	16 9 13.0	2 47.4	50.40	48.70	...	293 25 36.82	+ 1.77	+ 11.47	- 2 7.92	
12	σ Serpentis	W	...	16 14 25.0	2 49.3	48.80	48.20	...	322 20 1.32	+ 1.15	+ 19.90	- 43.03	+ 1 15 19.07
		E	...	16 19 45.5	2 31.2	48.90	48.90	...	37 39 6.18	+ 1.47	- 15.87	+ 43.03	
13	34 Herculis	E	...	16 24 56.0	2 33.4	50.35	49.00	...	349 44 9.60	+ 1.93	+ 36.68	- 10.10	+ 49 10 16.67
		W	...	16 30 31.0	3 1.6	50.35	48.25	...	10 15 17.60	+ 1.52	- 51.38	+ 10.10	
14	June 4, L. Corvi	W	...	12 2 35.0	2 37.4	46.90	47.60	...	299 0 23.05	+ 0.54	+ 11.14	- 1 37.93	- 22 5 25.05
		E	...	12 7 50.0	2 37.6	50.50	48.90	...	60 58 51.60	+ 2.10	- 11.16	+ 1 38.00	
15	12 Comæ Berenices	W	...	12 15 22.0	2 19.6	48.00	47.50	...	347 26 41.00	+ 0.77	+ 34.11	- 12.15	+ 26 22 42.62
		E	...	12 20 2.5	2 20.9	51.60	49.80	...	12 32 31.90	+ 2.81	- 34.75	+ 12.16	
16	8 Canum Venat.	E	2	12 29 ....	...	51.95	49.45	27.195	357 0 29.45	+ 3.45	+ 0.30	- 2.83	+ 41 52 48.76
		W	...	...	...	50.85	48.50	27.195	2 55 28.98	+ 2.75	- 0.30	+ 2.83	
17	330 G. Hydræ	W	...	12 36 20.0	2 34.9	47.70	47.50	...	293 18 10.42	+ 0.77	+ 9.80	- 2 6.15	- 27 48 6.10
		E	...	12 41 35.0	2 40.1	50.35	49.05	...	66 41 2.78	+ 2.16	- 10.47	+ 2 6.21	
18	δ Virginis	W	...	12 48 5.0	2 42.2	49.50	48.10	...	324 59 41.85	+ 1.50	+ 19.42	- 38.32	+ 3 55 2.58
		E	...	12 53 43.0	2 55.8	51.40	49.20	...	34 59 34.90	+ 2.51	- 22.81	+ 38.34	
19	17 Canum Venat.	W	2.5	13 6 ....	...	50.30	48.00	25.544	■ 4 30.12	+ 0.85	- 0.27	+ 0.09	+ 39 0 36.76
		E	...	...	...	50.35	48.65	25.544	359 53 49.48	+ 1.26	- 0.27	- 0.09	
20	γ Hydræ	W	...	13 11 5.0	2 38.7	50.95	48.40	...	298 25 42.08	+ 2.01	+ 11.21	- 1 40.87	- 22 40 6.68
		E	...	13 16 23.0	2 39.3	50.95	48.55	...	61 33 29.75	+ 2.08	- 11.30	+ 1 40.91	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
3 14 15	69.9	...	...	2, 3, 16. Instrument in meridian, observation at I with movable thread.	1	359 59 36.66	- 8.07
14 24	70.2	...	...	8. Instrument in meridian; W. observation at IX; E. observation at IX+6° with movable thread.	2	36.80	- 6.34
14 46	69.4	...	...		3	36.96	...
14 57	69.2	...	...	19. Instrument in meridian, observation at IX with movable thread.	4	36.96	...
15 8	69.0	71.0	29.873		5	37.14	+ 2.49
15 27	68.8	...	...		6	36.55	...
15 45	68.5	...	...		7	36.32	- 2.63
15 56	68.6	...	...		8	38.06	- 6.24
16 11	68.1	70.4	29.884		9	36.16	...
16 17	68.0	...	...		10	37.44	...
16 28	68.1	69.8	29.882		11	36.83	- 0.74
4 11 45	...	85.8	29.926		12	37.08	- 3.18
11 50	81.6	...	...	Notes.	13	37.98	- 6.42
12 5	80.3	...	...	2, 13, 17. Very faint.	14	38.67	...
12 18	79.8	...	...	10 E. Level correction assumed.	15	37.92	...
12 38	78.9	80.7	29.934		16	38.08	...
12 51	78.4	...	...		17	37.76	+ 16.44
13 14	77.7	...	...		18	38.70	...
13 27	77.2	...	...		19	39.20	- 4.70
					20	37.94	...

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	m Virginis	W	...	13 34 23.0	2 12.8	50.25	48.40	.....	312 51 55.62	+ 1.84	+10.10	- 59.10	- 8 13 13.30
		E	...	13 39 26.0	2 50.2	50.65	48.60	.....	47 7 24.05	+ 2.01	-16.60	+ 59.13	
2	92 Virginis	E	...	13 49 40.0	1 55.8	52.00	48.90	.....	37 23 11.75	+ 2.49	- 9.36	+ 42.03	+ 1 31 7.86
		W	...	13 54 20.5	2 44.7	50.70	48.10	.....	322 35 50.30	+ 1.79	+18.95	- 42.06	
	June 8, L.												
3	7 Corvi	E	...	12 9 15.0	1 38.9	53.50	47.60	.....	55 54 21.12	+ 2.05	- 4.79	+1 20.91	-17 0 43.78
		W	...	12 13 46.0	2 52.1	53.50	47.65	.....	304 4 42.45	+ 2.10	+14.51	-1 20.98	
4	8 Canum Venat.	W	4	12 29 .....	.....	55.35	48.10	25.948	2 56 23.38	+ 2.03	- 0.30	+ 2.85	+41 52 49.80
		E	...	.....	.....	54.20	47.90	25.948	357 1 22.88	+ 1.68	+ 0.30	- 2.85	
5	12 Canum Venat.	E	...	12 52 .....	.....	57.80	48.90	26.688	0 3 20.15	+ 4.53	+ 0.27	+ 0.08	+38 50 16.98
		W	...	.....	.....	59.35	49.90	26.688	359 53 20.28	+ 5.43	- 0.27	- 0.08	
6	7 Centauri	W	...	13 8 59.0	2 36.5	49.15	49.30	.....	290 6 31.82	+ 1.83	+ 9.49	-2 29.74	-31 0 6.45
		E	...	13 14 18.0	2 42.5	46.60	48.40	.....	69 52 39.60	+ 0.75	-10.23	+2 29.82	
7	70 Virginis	E	...	13 21 16.5	2 29.4	51.10	48.10	.....	24 37 21.10	+ 1.74	-22.02	+ 25.39	+14 17 28.40
		W	...	13 26 22.5	2 36.6	54.10	49.90	.....	335 21 47.15	+ 3.41	+24.20	- 25.39	
8	83 Virginis	W	...	13 36 21.0	3 0.3	51.65	48.65	.....	305 23 26.88	+ 2.17	+16.29	-1 17.84	-15 41 54.58
		E	...	13 42 23.0	3 1.7	49.75	48.10	.....	54 35 47.55	+ 1.43	-16.54	+1 17.86	
9	92 Virginis	E	3	13 48 45.0	2 51.5	51.25	48.40	.....	37 23 23.08	+ 1.93	-20.54	+ 42.37	+ 1 31 8.40
		W	...	13 54 13.0	2 36.5	53.75	49.50	.....	322 35 52.15	+ 3.13	+17.11	- 42.38	
10	94 Virginis	W	...	13 58 54.0	2 21.0	52.30	48.50	.....	312 39 1.58	+ 2.23	+11.34	-1 0.16	- 8 26 5.96
		E	...	14 3 48.0	2 33.0	49.45	47.70	.....	47 20 12.65	+ 1.09	-13.36	+1 0.17	
11	Boötis	E	...	14 10 8.0	2 39.8	50.70	48.15	.....	347 5 51.80	+ 1.60	+30.02	- 12.71	+51 48 44.02
		W	...	14 15 29.0	2 41.2	52.95	48.95	.....	12 53 20.40	+ 2.63	-30.54	+ 12.72	
12	204 B. Boötis	W	...	14 26 .....	.....	52.10	48.55	26.089	3 17 17.70	+ 1.49	- 0.30	+ 3.21	+42 13 51.44
		E	...	.....	.....	48.30	47.15	26.089	356 40 15.95	- 0.19	+ 0.30	- 3.21	
13	Boötis	E	...	14 33 35.0	2 40.0	50.15	48.00	.....	22 5 8.80	+ 1.45	-27.64	+ 22.57	+16 49 49.52
		W	...	14 38 46.5	2 31.5	54.00	49.15	.....	337 54 5.35	+ 3.02	+24.79	- 22.57	
14	ξ ² Libræ	W	...	14 49 15.0	2 21.0	51.40	48.35	.....	310 3 52.48	+ 1.97	+10.82	-1 6.07	-11 1 22.57
		E	...	14 54 29.0	2 53.0	48.65	47.65	.....	49 55 27.25	+ 0.92	-16.29	+1 6.10	
15	Libræ	E	...	15 4 3.0	2 44.6	51.25	48.40	.....	58 19 20.92	+ 1.93	-12.74	+1 30.05	-19 25 46.42
		W	...	15 9 41.0	2 53.4	54.05	49.35	.....	301 39 46.50	+ 3.12	+14.14	-1 30.08	
16	γ ¹ Serpentis	W	...	15 18 36.0	2 46.5	51.75	48.55	.....	336 50 12.68	+ 2.17	+28.79	- 23.83	+15 45 59.02
		E	...	15 24 2.0	2 39.5	48.40	47.55	.....	23 8 57.22	+ 0.79	-26.42	+ 23.83	
17	49 Libræ	E	...	15 52 8.0	2 51.1	50.90	48.00	.....	55 8 48.60	+ 1.62	-14.53	+1 19.93	-16 15 1.59
		W	...	15 57 34.0	2 34.9	55.40	49.60	.....	304 50 23.28	+ 3.54	+11.91	-1 19.93	
18	c ¹ Scorpii	W	...	16 3 34.0	2 52.5	53.20	49.05	.....	293 25 36.50	+ 2.75	+12.18	-2 7.88	-27 40 37.70
		E	...	16 9 17.0	2 50.5	49.45	47.55	.....	66 33 35.48	+ 1.07	-11.90	+2 7.95	
19	σ Serpentis	E	...	16 14 28.0	2 47.1	50.60	47.85	.....	37 39 9.55	+ 1.49	-19.39	+ 43.07	+ 1 15 19.59
		W	...	16 20 4.5	2 49.4	55.40	50.00	.....	322 19 59.65	+ 3.80	+19.92	- 43.11	

Time	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904 o.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>								<i>° ' "</i>	<i>"</i>
4 13 17	76.8	...	...	4.12 Instrument in meridian, observation at IX with movable thread.						1	350 59 38.48	...
13 52	75.9	78.4	29.946	6. Instrument in meridian, observation at I with movable thread.						2	37.94	+ 3.99
8 12 11	74.1	75.9	29.762							3	38.68	.....
12 49	71.6	...	...							4	39.82	.....
13 11	70.2	72.6	29.764							5	40.24	.....
13 28	69.8	...	...							6	36.67	+ 15.00
13 40	69.4	...	...							7	37.79	...
13 41	69.2	71.3	29.778							8	38.90	+ 9.04
14 1	69.0	...	...							9	38.42	+ 3.57
14 13	68.8	...	...							10	37.77	...
14 18	68.8	...	...							11	38.00	+ 9.26
14 16	68.1	...	...							12	38.06	...
14 52	67.6	70.0	29.787							13	37.88	...
15 7	67.1	...	...							14	38.50	...
15 22	67.1	...	...							15	36.92	...
15 44	66.8	68.9	29.797							16	37.68	- 3.81
15 55	66.8	...	...							17	37.21	...
16 6	65.0	...	...							18	38.08	- 0.52
16 12	66.9	...	...							19	37.49	- 1.78

Notes.
2, 10, 17. Paint.
8. Woolly.
4, 5, 6. Unsteady
12. Poor.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	34 Herculis	W	3	16 25 8.5	2 21.7	54.35	49.30	.....	10 14 56.68	+ 3.14	-31.30	+ 10.13	+49 10 17.96
	June 10, L.	E	...	16 29 50.0	2 19.8	49.50	47.10	.....	349 44 15.25	+ 0.80	+30.46	- 10.13	
2	δ Sagittæ	W	...	19 41 9.0	2 0.3	53.05	48.00	.....	339 22 21.90	+ 1.14	+16.56	- 21.64	+18 17 57.65
		E	...	19 45 18.5	2 9.2	53.95	48.25	.....	20 36 52.25	+ 1.52	-19.10	+ 21.64	
3	166 B. Camelop. s. p.	E	...	19 48 59.0	0 17.7	53.85	48.15	.....	293 7 34.40	+ 1.46	- 0.04	-2 13.79	+74 10 29.1
		W	...	19 53 28.0	4 46.7	53.50	48.00	.....	66 51 24.70	+ 1.28	+10.35	+2 13.80	
4	3 H. Ursæ Majoris s. p.	W	...	20 0 31.0	2 44.2	53.00	48.00	.....	72 15 51.38	+ 1.18	+ 4.35	+2 58.02	+68 45 25.43
		E	...	20 5 58.0	2 42.8	53.20	47.95	.....	287 43 20.58	+ 1.19	- 4.28	-2 58.03	
5	α² Capricorni	E	...	20 11 40.5	1 6.0	54.10	49.15	.....	51 44 0.52	+ 2.03	- 2.29	+1 12.84	-12 50 19.22
		W	...	20 15 51.0	3 4.5	54.05	48.60	.....	308 14 54.22	+ 1.71	+17.93	-1 12.86	
6	69 Aquilæ	W	...	20 22 7.0	2 33.7	52.15	47.50	.....	317 52 50.85	+ 0.69	+14.92	- 51.99	- 3 12 5.69
		E	...	20 27 1.0	2 20.3	53.00	48.40	.....	42 6 18.62	+ 1.33	-12.43	+ 51.98	
7	32 Vulpeculæ	W	3.5	20 47 42.5	2 48.3	50.70	47.20	.....	348 45 12.80	+ 0.19	+54.61	- 11.44	+27 41 35.61
		E	...	20 53 0.0	2 29.2	51.60	48.00	.....	11 13 49.25	+ 0.83	-42.93	+ 11.44	
8	ν Aquarii	E	...	21 1 55.0	2 29.4	53.40	48.20	.....	50 39 17.40	+ 1.36	-11.99	+1 10.18	-11 45 23.41
		W	...	21 7 7.0	2 42.6	54.60	48.55	.....	309 19 50.58	+ 1.86	+14.20	-1 10.18	
9	1 H. Draconis s. p.	W	...	21 20 43.0	2 39.6	53.60	48.50	.....	59 17 28.92	+ 1.57	+ 1.80	+1 36.78	+81 45 10.83
		E	...	21 26 12.0	2 49.4	50.55	47.30	.....	300 41 42.98	+ 0.21	- 2.03	-1 36.78	
10	γ Capricorni	E	...	21 32 23.0	2 25.7	51.90	47.80	.....	55 59 7.58	+ 0.79	-10.38	+1 25.23	-17 5 29.39
		W	...	21 37 17.0	2 28.3	54.50	48.55	.....	304 0 3.45	+ 1.83	+10.76	-1 25.25	
11	16 Pegasi	W	...	21 46 52.5	1 51.6	51.55	47.40	.....	346 32 39.38	+ 0.48	+20.52	- 13.80	+25 28 25.92
		E	...	21 51 39.5	2 55.4	51.35	47.50	.....	13 27 4.75	+ 0.49	-50.65	+ 13.81	
12	α Aquarii	E	...	21 57 11.0	3 42.4	53.35	48.10	.....	39 41 38.22	+ 1.31	-32.85	+ 47.90	- 0 47 0.55
		W	...	22 1 20.0	0 26.6	55.50	48.75	.....	320 18 5.02	+ 2.19	+ 0.47	- 47.87	
13	ζ Cephei	W	...	22 5 11.0	2 23.4	54.05	48.00	.....	18 47 46.10	+ 1.44	-14.45	+ 19.65	+57 43 33.35
	June 11, L.	E	...	22 9 27.0	1 52.6	51.55	47.75	.....	341 11 29.75	+ 0.69	+ 8.91	- 19.65	
14	73 Virginis	W	...	13 24 3.0	2 51.9	49.55	47.50	.....	302 51 19.75	+ 0.05	+14.17	-1 25.44	-18 14 11.53
		E	...	13 29 21.0	2 26.1	53.00	49.70	.....	57 7 47.95	+ 2.03	-10.24	+1 25.51	
15	m Virginis	E	...	13 34 1.0	2 36.0	54.20	50.00	.....	47 7 18.42	+ 2.46	-13.94	+ 59.62	- 8 13 13.33
		W	...	13 39 2.0	2 25.0	51.50	48.20	.....	312 51 52.95	+ 0.91	+12.05	- 59.68	
16	7 Boötis	W	...	13 45 55.0	2 45.0	49.80	47.75	.....	339 28 31.40	+ 0.21	+31.28	- 20.77	+18 24 22.32
		E	...	13 51 15.5	2 35.5	49.80	48.65	.....	20 30 37.48	+ 0.67	-27.78	+ 20.77	
17	94 Virginis	E	...	13 58 38.0	2 37.5	52.70	49.50	.....	47 20 11.30	+ 1.80	-14.15	+1 0.19	- 8 26 6.21
		W	...	14 3 55.0	2 39.5	52.60	48.50	.....	312 38 57.45	+ 1.30	+14.52	-1 0.20	
18	λ Virginis	W	...	14 11 14.0	2 43.7	50.15	47.05	.....	308 9 24.52	+ 0.44	+14.09	-1 10.62	-12 55 50.83
		E	...	14 17 7.0	3 9.3	51.00	48.80	.....	51 49 50.88	+ 1.08	-18.84	+1 10.62	
19	g Boötis	E	...	14 22 35.5	2 44.3	52.35	49.20	.....	348 37 48.92	+ 1.62	+37.17	- 11.17	+50 16 36.29
		W	...	14 28 24.5	3 4.7	51.80	48.25	.....	11 21 30.25	+ 1.00	-46.97	+ 11.18	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
8 16 27	65.1	67.7	29.801				1	359 59 37.52	- 7.96
10 19 43	53.2	56.2	29.883				2	37.14	.....
19 52	53.0	.....	.....				3	36.08	.....
20 4	52.7	.....	.....				4	37.20	.....
20 15	52.8	.....	.....				5	37.05	.....
20 25	52.6	.....	.....				6	36.98	-11.86
20 34	52.6	.....	.....				7	37.38	.....
20 50	52.3	54.7	29.866				8	36.70	.....
21 5	51.9	.....	.....				9	36.72	.....
21 23	51.6	.....	.....				10	37.00	.....
21 35	51.5	.....	.....				11	37.49	.....
21 41	.....	53.6	29.848				12	37.20	.....
21 49	51.2	.....	.....				13	36.22	.....
21 59	50.9	.....	.....				14	36.89	+10.45
22 8	51.1	53.4	29.846	Note.			15	36.40	- 1.44
11 13 26	70.6	72.9	29.799	8. Clouds			16	36.61	.....
13 37	69.7	.....	.....				17	36.10	.....
13 49	69.5	.....	.....				18	36.08	.....
14 1	69.1	.....	.....				19	36.00	- 9.75
14 14	68.8	.....	.....				
14 26	68.6	.....	.....				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	π Boötis	W	...	14 33 31.0	2 44.5	50.15	47.95	...	337 54 3.48	+0.46	+29.23	-22.58	+16 49 50.27
		E	...	14 38 46.0	2 30.5	50.25	48.60	...	22 5 4.80	+0.78	-24.46	+22.58	
2	ξ^2 Libræ	E	...	14 49 7.0	2 29.5	53.55	49.50	...	49 55 20.78	+2.05	-12.16	+1 6.07	-11 1 23.15
		W	...	14 54 19.0	2 42.5	53.15	48.75	...	310 3 46.88	+1.60	+14.37	-1 6.08	
3	c Boötis	W	...	15 0 15.0	2 52.8	50.35	47.60	...	346 18 24.12	+0.27	+48.44	-13.56	+25 14 39.05
		E	...	15 5 33.5	2 25.7	51.10	48.60	...	13 40 34.75	+0.97	-34.44	+13.56	
4	ϵ^2 Libræ	E	...	15 15 1.0	2 42.7	53.40	49.50	...	53 41 20.12	+2.02	-13.47	+1 15.68	-14 47 30.73
		W	...	15 20 23.0	2 39.3	53.60	49.00	...	306 17 50.18	+1.83	+12.92	-1 15.70	
5	B. D. +43° 2510	W	...	15 32	...	51.25	48.20	26.251	4 32 34.82	+0.07	-0.32	+4.45	+43 29 15.43
		E	...	...	...	51.20	48.50	26.251	355 24 45.72	+0.22	+0.32	-4.45	
6	γ Lupi	E	2	15 42 7.0	2 48.2	52.30	49.00	...	72 12 18.25	+1.45	-10.53	+2 51.89	-33 20 8.55
		W	...	15 47 37.0	2 41.8	52.45	48.00	...	287 46 51.45	+1.01	+9.75	-2 51.90	
7	June 13, L. 12 Canum Venat.	W	...	12 52	...	49.50	47.50	28.006	359 52 30.10	+0.91	-0.27	-0.08	+38 50 17.69
		E	...	...	...	49.65	47.60	28.006	0 2 27.60	+1.00	+0.27	+0.08	
8	r Centauri	E	...	13 9 43.0	1 53.4	52.50	48.80	...	69 52 32.45	+3.03	-4.98	+2 32.82	-31 0 8.15
		W	...	13 13 11.0	1 34.6	53.75	49.55	...	290 6 39.02	+3.73	+3.47	-2 32.86	
9	γ^0 Virginis	W	...	13 21 8.0	2 38.8	52.15	48.85	...	335 21 48.72	+3.04	+24.88	-25.91	+14 17 29.07
		E	...	13 26 12.5	2 25.7	51.95	48.55	...	24 37 18.45	+2.82	-20.95	+25.92	
10	δ^3 Virginis	E	...	13 36 30.0	2 52.1	52.65	48.55	...	54 35 42.90	+3.01	-14.84	+1 19.45	-15 41 54.81
		W	...	13 41 31.0	2 8.9	53.95	49.50	...	305 23 34.60	+3.80	+8.33	-1 19.49	
11	γ Boötis	E	...	13 45 58.3	2 42.1	52.50	48.40	...	20 30 38.25	+2.83	-30.19	+21.19	+18 24 22.23
		W	...	13 51 3.0	2 22.6	54.00	49.40	...	339 28 37.00	+3.72	+23.36	-21.20	
12	π Hydræ	W	...	13 58 32.0	2 25.7	52.55	49.00	...	294 52 50.60	+3.17	+8.90	-2 1.51	-26 13 20.85
		E	...	14 3 27.0	2 29.3	51.65	48.15	...	65 6 21.80	+2.50	-9.35	+2 1.57	
13	λ Virginis	E	...	14 11 8.0	2 50.2	51.60	48.10	...	51 49 44.88	+2.52	-15.23	+1 12.09	-12 55 50.29
		W	...	14 16 21.0	2 22.8	53.25	49.05	...	308 9 28.00	+3.40	+10.72	-1 12.11	
14	g Boötis	W	2	14 22 36.0	2 44.3	53.50	49.05	...	11 21 20.00	+3.45	-37.17	+11.41	+50 16 37.43
		E	...	14 27 43.0	2 22.7	51.10	47.85	...	348 37 57.58	+2.28	+28.05	-11.41	
15	ζ Boötis	E	...	14 33 57.0	2 40.0	51.05	47.60	...	24 46 23.58	+2.07	-25.13	+26.22	+14 8 27.79
		W	...	14 38 55.0	2 18.0	53.10	49.20	...	335 12 52.78	+3.41	+18.70	-26.23	
16	321 B. Boötis	W	...	14 49 6.0	2 38.5	51.65	48.30	...	335 54 25.80	+2.57	+25.25	-25.42	+14 50 6.37
		E	...	14 54 6.5	2 22.0	51.15	47.55	...	24 4 41.88	+2.09	-20.27	+25.43	
17	c Boötis	E	...	15 0 14.3	2 53.9	50.95	47.55	...	13 40 46.62	+2.04	-49.06	+13.87	+25 14 40.57
		W	...	15 5 33.7	2 25.5	53.25	49.00	...	346 18 37.12	+3.33	+34.36	-13.87	
18	ϵ^2 Libræ	W	...	15 15 1.0	2 43.1	51.45	48.30	...	306 17 52.88	+2.58	+13.54	-1 17.39	-14 47 30.32
		E	...	15 20 6.0	2 21.9	50.80	47.50	...	53 41 16.75	+2.00	-10.25	+1 17.41	
19	φ Boötis	E	...	15 34	...	51.05	47.55	27.035	358 13 19.52	+2.82	+0.29	-1.74	+40 40 5.67
		W	...	...	...	52.30	48.60	27.035	1 42 53.48	+3.64	-0.29	+1.73	
20	12 H. Draconis	W	...	15 42 49.0	2 26.5	51.80	48.10	...	23 58 0.70	+2.58	-10.21	+25.36	+62 53 56.83
		E	...	15 47 48.0	2 32.5	50.15	47.10	...	336 1 11.12	+1.63	+11.06	-25.37	

Time	Ther- m.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below		No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>					
11 14 17	66.4	76.2	29.810	5.7. Instrument in meridian, observation at IX with movable thread.		1	359 59 37.11	
14 57	68.1			19. Instrument in meridian, observation at I with movable thread		2	36 76	
15 1	67.7					3	37.06	-5.42
16 15	67.5					4	36.79	
18 29	67.2					5	37.62	-8.83
19 45	67.1	69.2	29.814			6	35.68	+2.13
11 20 16	66.1	69.7	29.816			7	38.68	
19 15	66.6					8	38.14	+15.09
19 12	64.7	66.1	29.811			9	38.48	
19 14	64.2					10	38.88	+8.89
19 19	63.6					11	37.48	-1.69
19 49	61.3 [*]					12	38.84	
19 1	61.9					13	37.14	
19 14	62.2					14	37.10	-16.15
19 23	61.2					15	37.20	
19 37	61.6					16	38.66	
19 52	61.1					17	35.29	-6.59
19 1	60.6					18	38.76	
19 14	60.3	69.4	29.815			19	38.96	-8.93
19 31	60.1					20	38.11	-11.49
19 47	59.7							

Note
* Thermometer reading decreased .2°

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	66 H ¹ . Draconis	E	...	15 53 9.0	2 25.0	50.45	47.20	...	343 53 26.80	+ 1.76	+18.44	- 16.48	+55 1 25.42
		W	...	15 57 38.5	2 4.5	52.30	48.85	...	16 5 41.75	+ 3.06	-13.60	+ 16.49	
2	τ Coronæ Borealis	W	...	16 5 ....	...	52.40	48.85	26.752	357 47 16.80	+ 2.35	- 0.25	- 2.18	+36 44 13.31
		E	...	...	...	51.10	47.35	26.752	2 9 20.05	+ 1.27	+ 0.25	+ 2.18	
3	ξ Coronæ Borealis	E	...	16 18 ....	...	50.10	47.00	26.460	7 46 36.70	+ 2.28	+ 0.20	+ 7.84	+31 7 1.49
		W	...	...	...	51.95	48.10	26.460	352 10 21.10	+ 3.28	- 0.20	- 7.84	
4	λ Ophiuchi	W	3.5	16 23 30.0	2 37.9	50.55	47.55	...	323 16 27.95	+ 1.93	+17.68	- 42.62	+ 2 11 42.46
		E	...	16 28 28.0	2 20.1	50.90	47.60	...	36 42 42.95	+ 2.05	-13.92	+ 42.60	
5	June 14, L. Virginis (mean)	E	...	12 34 14.0	2 36.6	55.70	50.00	...	39 49 49.05	+ 2.98	-16.24	+ 46.71	- 0 55 29.93
		W	...	12 39 25.5	2 34.9	53.10	48.55	...	320 9 18.22	+ 1.60	+15.89	- 46.72	
6	ε Ursæ Majoris	W	...	12 47 11.0	2 39.6	50.05	47.60	...	17 33 20.80	+ 0.36	-19.78	+ 17.75	+56 28 59.91
		E	...	12 52 20.5	2 29.9	52.95	49.55	...	342 25 51.20	+ 2.08	+17.45	- 17.75	
7	θ Virginis	E	...	13 1 57.0	3 4.8	55.00	50.30	...	43 56 0.12	+ 2.97	-20.80	+ 54.06	- 5 1 42.49
		W	...	13 6 57.5	1 55.7	52.30	48.00	...	316 3 22.50	+ 1.12	+ 8.15	- 54.06	
8	61 Virginis	W	2	13 10 51.0	2 35.2	50.05	47.40	...	303 18 43.52	+ 0.74	+11.64	-1 25.23	-17 46 49.29
		E	...	13 15 52.0	2 25.8	53.10	49.15	...	56 40 25.55	+ 2.36	-10.28	+1 25.27	
9	73 Virginis	E	...	13 24 17.0	2 38.5	53.65	49.40	...	57 7 46.75	+ 2.68	-12.05	+1 26.84	-18 14 11.01
		W	...	13 29 31.0	2 35.5	53.45	48.80	...	302 51 21.50	+ 2.33	+11.60	-1 26.88	
10	h Centauri	W	4	13 45 4.0	2 40.8	51.25	48.00	...	289 39 19.68	+ 0.86	+ 9.94	-2 36.32	-31 27 25.50
		E	...	13 50 23.0	2 38.2	53.15	49.80	...	70 19 49.80	+ 2.25	- 9.62	+2 36.30	
11	π Hydræ	E	...	13 58 6.0	2 52.0	53.70	49.05	...	65 6 23.68	+ 1.96	-12.41	+2 0.94	-26 13 20.57
		W	...	14 3 33.0	2 35.0	52.30	48.90	...	294 52 48.72	+ 1.55	+10.08	-2 0.97	
12	λ Boötis	W	...	14 13 ....	...	51.05	48.10	25.850	7 35 26.38	+ 0.63	- 0.36	+ 7.54	+46 31 53.33
		E	...	...	...	51.65	49.00	25.850	352 22 27.15	+ 1.21	+ 0.36	- 7.54	
13	φ Virginis	E	...	14 20 40.0	2 38.8	52.50	48.75	...	40 42 14.12	+ 2.01	-16.39	+ 48.53	- 1 47 54.11
		W	...	14 25 50.0	2 31.2	52.05	48.45	...	319 16 58.30	+ 1.77	+14.86	- 48.54	
14	ζ Boötis	W	...	14 33 44.5	2 52.7	49.05	47.45	...	335 12 45.12	+ 0.52	+29.28	- 26.09	+14 8 27.10
		E	...	14 39 8.0	2 30.8	51.40	48.35	...	24 46 22.98	+ 1.54	-22.32	+ 26.09	
15	321 B. Boötis	E	3.5	14 49 8.0	2 36.7	52.50	48.50	...	24 4 45.35	+ 1.90	-24.68	+ 25.27	+14 50 6.41
		W	...	14 54 17.0	2 32.3	52.85	48.85	...	335 54 26.80	+ 2.16	+23.31	- 25.26	
16	1 Lupi	W	...	15 6 10.0	2 38.6	51.50	48.20	...	289 56 58.28	+ 1.50	+ 9.71	-2 34.39	-31 9 44.90
		E	...	15 11 27.0	2 38.4	51.05	48.15	...	70 2 12.50	+ 1.35	- 9.69	+2 34.40	
17	η Coronæ Borealis	E	...	15 19 ....	...	51.20	48.10	26.937	8 15 7.45	+ 2.12	+ 0.20	+ 8.23	+30 38 10.41
		W	...	...	...	52.90	48.85	26.937	351 41 10.68	+ 2.92	- 0.20	- 8.23	
18	3 H. Scorpii	W	...	15 28 41.0	2 34.9	52.85	48.85	...	293 17 13.80	+ 2.18	+ 9.80	-2 10.55	-27 49 4.69
		E	...	15 33 33.0	2 17.1	51.10	47.85	...	66 41 54.10	+ 1.27	- 7.68	+2 10.57	
19	12 H. Draconis	E	...	15 42 28.5	2 47.2	50.85	47.65	...	336 1 8.25	+ 1.08	+13.30	- 25.17	+62 53 57.03
		W	...	15 47 38.0	2 22.3	53.50	49.25	...	23 57 59.75	+ 2.57	- 9.63	+ 25.17	
20	66 H ¹ . Draconis	W	...	15 52 48.0	2 46.2	53.20	48.95	...	16 5 51.68	+ 2.34	-24.22	+ 16.35	+55 1 25.55
		E	...	15 58 6.0	2 31.8	50.35	47.30	...	343 53 24.05	+ 0.79	+20.21	- 16.35	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
13 15 56	59.3	...	...	2, 12. Instrument in meridian, observation at IX with movable thread.	1	359 59 39.11	-10.57
16 11	57.9	...	...	3, 17. Instrument in meridian, observation at I with movable thread.	2	37.90	- 8.50
16 26	58.7	61.3	30.046		3	37.43	- 7.92
14 12 37	67.1	70.8	29.956		4	39.31	...
12 50	66.9	...	...		5	35.74	...
13 4	66.2	...	...		6	36.06	...
13 13	65.9	...	...		7	37.03	...
13 27	65.2	...	...		8	36.78	...
13 48	64.2	67.8	29.965		9	36.38	+10.46
14 1	63.9	...	...		10	36.49	+12.55
14 9	63.7	...	...		11	36.78	...
14 23	63.6	...	...		12	38.52	...
14 37	62.9	...	...	Notes.	13	37.33	+ 2.24
14 51	62.9	65.4	29.962*	3 E. One microscope reading decreased 10".	14	38.56	...
15 9	62.6	...	...	16. Very faint.	15	37.47	...
15 31	62.6	...	...	* Barometer reading changed from 29.912 to 29.962 rev.	16	36.83	+ 5.46
15 45	62.1	...	...		17	36.80	...
15 56	62.0	64.1	29.952		18	36.74	+ 2.86
					19	37.06	-11.73
					20	37.47	-10.84

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Coronæ Borealis	E	...	16 5 ....	...	50.60	47.30	26.692	2 9 21.32	+ 1.58	+ 0.25	+ 2.16	+36 44 13.46
		W	...	...	...	53.50	48.75	26.692	357 47 17.95	+ 3.03	- 0.25	- 2.16	
2	Coronæ Borealis	W	...	16 18 ....	...	52.60	48.45	26.092	352 10 37.28	+ 1.16	- 0.20	- 7.78	+31 7 1.20
		E	...	...	...	51.05	47.85	26.092	7 46 53.25	+ 0.49	+ 0.20	+ 7.78	
3	Ophiuchi	E	...	16 24 9.0	1 59.1	51.50	47.90	...	36 42 37.92	+ 1.34	-10.06	+ 42.30	+ 2 11 43.04
	June 15, L.	W	...	16 28 13.0	2 4.9	54.50	49.50	...	323 16 32.28	+ 2.89	+11.06	- 42.31	
4	b ² Cygni	E	...	20 6 ....	...	51.40	48.00	26.056	2 20 30.38	+ 1.60	+ 0.25	+ 2.32	+36 33 28.78
		W	...	...	...	53.90	48.45	26.056	357 36 58.55	+ 2.47	- 0.25	- 2.32	
5	α ¹ Capricorni	W	...	20 10 4.0	2 19.6	52.25	47.65	...	308 17 15.82	+ 0.94	+10.27	-1 11.02	-12 48 3.99
		E	...	20 14 19.0	1 55.4	50.35	47.40	...	51 41 53.28	+ 0.36	- 7.02	+1 11.04	
6	69 Aquilæ	E	...	20 22 11.0	2 30.8	52.20	48.30	...	42 6 21.05	+ 1.21	-14.36	+ 50.76	- 3 12 5.12
		W	...	20 27 9.0	2 27.2	53.90	48.40	...	317 52 50.12	+ 1.70	+13.09	- 50.75	
7	ν Capricorni	W	...	20 31 52.0	2 47.0	52.25	47.75	...	302 37 13.12	+ 0.98	+13.33	-1 27.56	-18 28 20.58
		E	...	20 38 27.0	3 48.0	52.40	48.50	...	57 22 10.58	+ 1.36	-24.84	+1 27.59	
8	ν Cygni	E	...	20 54 ....	...	53.20	48.55	25.720	358 6 25.32	+ 2.31	+ 0.29	- 1.84	+40 47 51.84
	June 17, L.	W	...	...	...	55.70	49.35	25.720	1 51 31.18	+ 3.37	- 0.29	+ 1.84	
9	ε Ursæ Majoris	E	...	12 47 8.0	2 43.2	57.20	52.10	...	342 25 48.58	+ 3.56	+20.68	- 17.56	+56 29 0.50
		W	...	12 52 17.0	2 25.8	56.15	51.20	...	17 33 18.68	+ 2.82	-16.50	+ 17.58	
10	θ Virginis	W	...	13 2 17.0	2 45.4	53.20	50.00	...	316 3 15.15	+ 1.48	+16.66	- 53.49	- 5 1 42.32
		E	...	13 7 16.0	2 13.6	54.10	50.70	...	43 55 53.40	+ 2.08	-10.87	+ 53.52	
11	61 Virginis	E	...	13 13 29.0	0 2.2	56.40	52.00	...	56 40 16.68	+ 3.23	0.00	+1 24.42	-17 46 49.47
		W	...	13 17 9.0	3 42.2	57.05	51.50	...	303 18 29.18	+ 3.15	+23.87	-1 24.49	
12	69 H. Ursæ Majoris	W	...	13 22 9.0	2 49.7	55.35	51.00	...	21 30 52.18	+ 2.49	-16.43	+ 21.97	+60 26 39.86
		E	...	13 27 25.0	2 26.3	54.95	51.30	...	338 28 21.40	+ 2.53	+12.21	- 21.98	
13	h Centauri	E	...	13 44 57.0	2 48.3	57.90	52.15	...	70 19 51.28	+ 3.76	-10.88	+2 34.86	-31 27 24.52
		W	...	13 50 19.0	2 33.7	59.20	52.25	...	289 39 18.05	+ 4.10	+ 9.08	-2 34.94	
14	α Draconis	W	...	13 59 16.0	2 34.6	56.95	51.40	...	25 54 17.50	+ 3.07	- 9.86	+ 27.16	+64 50 16.34
		E	...	14 4 22.0	2 31.4	55.15	51.30	...	334 4 53.98	+ 2.60	+ 9.46	- 27.16	
15	λ Boötis	E	...	14 13 ....	...	56.05	51.45	27.428	352 21 19.98	+ 3.65	+ 0.36	- 7.48	+46 31 53.26
		W	...	...	...	58.25	51.55	27.428	7 34 18.05	+ 4.19	- 0.36	+ 7.48	
16	φ Virginis	W	...	14 21 7.5	2 11.9	55.50	50.95	...	319 17 1.60	+ 2.52	+11.31	- 48.15	- 1 47 54.54
		E	...	14 25 39.0	2 19.6	54.50	50.75	...	40 42 12.42	+ 2.13	-12.67	+ 48.16	
17	ε ¹ Centauri	E	2.5	14 35 10.0	2 41.8	57.35	51.70	...	73 37 38.48	+ 3.39	- 9.51	+3 8.18	-34 45 45.62
		W	...	14 40 37.0	2 45.2	59.85	52.45	...	286 21 29.55	+ 4.37	+ 9.91	-3 8.20	
18	43 B. Libræ	W	...	14 49 4.0	2 52.1	56.90	51.05	...	300 6 39.10	+ 2.90	+13.56	-1 36.25	-20 59 2.64
		E	...	14 54 24.0	2 27.9	54.80	50.25	...	59 52 30.05	+ 1.97	-10.02	+1 36.26	
19	ι Lupi	E	...	15 5 54.0	2 55.2	56.80	51.30	...	70 2 14.82	+ 3.03	-11.86	+2 32.95	-31 9 44.50
		W	...	15 11 20.0	2 36.8	59.00	51.70	...	289 56 55.95	+ 3.76	+ 9.50	-2 32.96	

Time	Ther. obs.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904 0.
<i>h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>in.</i>	<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>		<i>° ' "</i>	<i>"</i>
14 10 32	61.1			1.4.8.17				1	359 59 17.16	- 8.74
15 10 32	60.8	61.2	29.922	2.				2	36.81	- 8.14
15 20 35	64.6	66.5	29.849					3	17.71	
16 10 32	64.2							4	15.75	- 4.86
16 24	63.9							5	16.84	
16 35	63.7							6	16.71	-12.79
16 52	63.6							7	17.28	
17 1	63.4	65.1	29.841					8	16.62	
17 12 17	72.6							9	18.92	
17 43		73.1	29.928					10	18.96	
17 50	71.2							11	18.62	
18 5	70.5							12	17.18	
18 16	69.7							13	17.66	+12.72
18 25	69.2							14	18.18	
18 45	68.0	69.7	29.915					15	18.22	
19 2	67.5							16	38.66	+ 2.10
19 24	66.8							17	38.08	+ 9.26
19 35	66.8	68.2	29.917					18	18.28	
19 52	66.6							19	37.60	+ 5.74

Note
18.11.12.13 Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	η Coronæ Borealis	W	...	15 19 ....	...	58.05	51.30	26.812	351 41 18.65	+ 2.61	- 0.20	- 8.16	+30 38 11.33
		E	...	...	...	54.75	50.25	26.812	8 15 14.30	+ 1.26	+ 0.20	+ 8.16	
2	B. D. + 43° 25' 10"	E	...	15 32 ....	...	55.90	50.55	26.508	355 24 32.38	+ 3.13	+ 0.32	- 4.48	+43 29 16.49
		W	...	...	...	58.70	51.55	26.508	4 32 22.18	+ 4.31	- 0.32	+ 4.48	
3	ζ Lupi	W	...	15 42 3.0	2 53.5	56.75	50.80	...	287 46 52.15	+ 2.74	+11.20	-2 52.80	-33 20 7.76
		E	...	15 47 7.0	2 10.5	53.95	49.50	...	72 12 14.68	+ 1.37	- 6.34	+2 52.79	
4	ε Coronæ Borealis	E	...	15 51 5.0	2 35.8	54.70	50.00	...	11 45 56.82	+ 1.88	-44.94	+ 11.60	+27 9 28.62
		W	...	15 55 50.0	2 9.2	58.80	51.65	...	348 13 26.08	+ 3.71	+30.91	- 11.68	
5	φ Herculis	W	...	16 6 ....	...	56.75	50.55	26.513	6 14 28.28	+ 1.87	- 0.34	+ 6.16	+45 11 21.39
		E	...	...	...	53.45	49.45	26.513	353 42 32.18	+ 0.51	+ 0.34	- 6.16	
6	τ Herculis	E	...	16 17 ....	...	54.75	49.00	26.612	352 21 8.45	+ 2.53	+ 0.36	- 7.51	+46 32 39.64
		W	...	...	...	58.55	51.40	26.612	7 35 38.02	+ 4.27	- 0.36	+ 7.51	
7	ρ Herculis	W	...	16 25 ....	...	57.50	51.15	26.112	3 9 8.25	+ 2.39	- 0.30	+ 3.11	+42 5 43.52
		E	...	...	...	53.60	49.55	26.112	356 48 22.30	+ 0.59	+ 0.30	- 3.11	
8	June 18, L. α Ursæ Minoris S. P.	W	...	13 11 30.0	13 1.6	53.80	50.40	...	52 15 33.85	+ 2.09	+ 6.90	+1 10.23	+88 47 28.60
		E	...	13 16 42.0	7 49.6	56.65	51.75	...	307 43 33.28	+ 3.47	- 2.49	-1 10.32	
9	60 H. Ursæ Majoris	E	...	13 22 7.0	2 51.8	55.25	51.00	...	338 28 16.82	+ 2.69	+16.84	- 21.53	+60 26 40.39
		W	...	13 28 9.0	3 10.2	53.00	50.80	...	21 30 58.92	+ 2.07	-20.63	+ 21.56	
10	η Boötis	W	...	13 47 31.5	2 39.2	49.55	48.75	...	339 56 58.40	+ 0.19	+29.69	- 20.01	+18 52 45.89
		E	...	13 52 35.0	2 24.3	53.85	51.20	...	20 2 12.10	+ 2.45	-24.40	+ 20.02	
11	ρ H. Boötis	W	...	14 4 ....	...	52.20	49.55	25.803	5 22 27.35	+ 0.49	- 0.33	+ 5.18	+44 18 48.82
		E	...	...	...	56.15	51.90	25.803	354 35 30.88	+ 2.70	+ 0.33	- 5.18	
12	θ Boötis	E	...	14 19 13.0	2 46.4	57.90	52.30	...	346 36 43.68	+ 4.02	+31.05	- 13.08	+52 17 49.92
		W	...	14 24 1.0	2 1.6	54.10	50.25	...	13 22 13.30	+ 2.03	-16.59	+ 13.08	
13	56 B. Draconis	W	2	14 27 38.0	1 32.1	53.50	50.05	...	21 43 8.85	+ 1.82	- 4.76	+ 21.92	+60 39 6.17
		E	...	14 31 33.0	2 22.9	56.00	51.55	...	338 15 56.40	+ 3.23	+11.47	- 21.93	
14	Piazz 166	E	...	14 38 8.0	2 40.8	56.80	51.65	...	59 39 40.90	+ 3.47	-11.88	+1 33.76	-20 46 12.35
		W	...	14 43 58.0	3 9.2	54.30	50.50	...	300 19 22.95	+ 2.26	+16.45	-1 33.79	
15	43 B. Libræ	E	...	14 49 7.0	2 49.3	56.65	51.75	...	59 52 32.05	+ 3.43	-13.13	+1 34.60	-20 59 1.70
		W	...	14 54 19.0	2 22.7	55.05	50.95	...	300 6 42.50	+ 2.64	+ 9.33	-1 34.60	
16	June 20, L. α ¹ Capricorni	E	...	20 10 37.0	1 47.7	58.95	51.75	...	51 41 49.62	+ 2.94	- 6.12	+1 9.82	-12 48 2.99
		W	...	20 15 7.0	2 42.3	58.10	51.20	...	308 17 10.15	+ 2.41	+13.88	-1 9.84	
17	42 Cygni	W	...	20 26 ....	...	56.00	50.35	26.564	357 11 21.42	+ 0.75	- 0.24	- 2.69	+36 8 7.50
		E	...	...	...	56.50	51.05	26.564	2 45 33.75	+ 1.24	+ 0.24	+ 2.69	
18	ν Capricorni	E	...	20 32 7.0	2 33.1	57.60	51.65	...	57 21 55.40	+ 2.55	-11.20	+1 26.11	-18 28 19.24
		W	...	20 36 49.0	2 8.9	57.65	50.95	...	302 37 16.70	+ 2.18	+ 7.94	-1 26.13	
19	32 Vulpeculæ	E	...	20 48 15.5	2 17.5	58.45	51.95	...	11 13 37.92	+ 2.90	-36.48	+ 10.99	+27 41 38.24
		W	...	20 52 41.5	2 8.5	58.85	51.80	...	348 45 34.32	+ 2.93	+31.86	- 10.99	
20	ν Aquarii	W	...	21 1 49.0	2 37.7	56.05	50.50	...	309 19 50.95	+ 1.59	+13.36	-1 7.39	-11 45 22.19
		E	...	21 7 7.0	2 40.3	57.05	51.50	...	50 39 20.65	+ 2.31	-13.80	+1 7.41	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m</i>			<i>° ' "</i>	<i>"</i>
17 15 27	66.3	...	...	1, 5, 7, 11, 17. Instrument in meridian, observation at IX with movable thread.	1	359 59 38.53	...
15 45	66.2	68.1	29.914	2, 6. Instrument in meridian, observation at I with movable thread.	2	38.71	-10.18
15 54	66.2	...	...		3	37.90	+ 2.69
16 14	65.6	...	...		4	37.24	...
16 29	65.3	67.4	29.904		5	39.33	...
18 13 15	80.2	83.2	29.898		6	38.58	...
13 25	78.9	...	...		7	38.30	- 0.98
13 50	76.8	78.7	29.895		8	38.50	...
14 1	76.5	...	...		9	38.37	...
14 18	75.8	...	...		10	39.22	...
14 41	75.2	...	...		11	39.62	- 0.42
14 52	75.1	76.3	29.903		12	38.74	...
20 20 14	69.5	72.1	29.670	Notes.	13	38.50	-12.69
20 35	69.0	...	...	6. Micrometer reading increased 1 rev.	14	37.06	+ 5.88
20 51	68.9	...	...	14. Very faint.	15	38.41	...
21 5	68.8	...	...	20. Diffuse.	16	36.43	...
					17	38.57	- 5.55
					18	36.78	...
					19	36.72	...
					20	37.54	...

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 H. Draconis s. p.	E	...	21 20 40.0	2 43.7	55.95	50.80	...	300 41 35.88	+ 1.70	- 1.90	-1 32.90	+81 45 8.84
		W	...	21 26 34.0	3 10.3	59.05	52.05	...	59 17 32.85	+ 3.09	+ 2.56	+1 32.91	
2	7 Capricorni	W	...	21 32 5.0	2 46.0	57.80	51.15	...	303 59 59.12	+ 2.35	+ 13.48	-1 21.85	-17 5 28.30
		E	...	21 37 6.0	2 15.0	57.25	51.65	...	55 59 8.00	+ 2.43	- 8.91	+1 21.87	
3	16 Pegasi	E	...	21 46 54.3	1 52.0	58.05	51.55	...	13 26 29.88	+ 2.55	- 20.67	+ 13.25	+25 28 28.76
		W	...	21 50 29.0	1 42.7	60.20	52.00	...	346 32 41.38	+ 3.33	+ 17.38	- 13.25	
4	φ Aquarii	W	...	21 57 46.0	3 9.7	57.35	51.15	...	320 17 43.08	+ 2.23	+ 23.91	- 45.97	- 0 46 58.29
		E	...	22 1 46.0	0 50.3	56.15	50.80	...	39 41 7.50	+ 1.73	- 1.68	+ 45.96	
5	ζ Cephei	E	...	22 5 15.5	2 21.3	56.90	51.10	...	341 11 20.58	+ 2.08	+ 14.03	- 18.87	+57 43 36.39
		W	...	22 8 59.0	1 22.2	58.95	51.70	...	18 47 39.90	+ 2.91	- 4.75	+ 18.86	
6	2 Lacertæ	W	...	22 17 ....	...	57.95	51.10	28.004	7 5 14.20	+ 1.60	- 0.35	+ 6.93	+46 3 9.52
		E	...	...	...	56.80	50.65	...	352 51 51.28	+ 1.12	+ 0.35	- 6.93	
7	7 Lacertæ	E	4	22 24 40.5	2 44.7	57.95	51.15	...	349 7 6.25	+ 2.36	+ 39.40	- 10.65	+49 47 16.66
		W	...	22 33 53.3	6 28.1	56.00	50.45	...	10 55 3.08	+ 1.51	- 38.30	+ 10.70	
8	μ Pegasi	W	...	22 42 30.5	2 56.1	53.25	49.05	...	345 9 32.02	+ 0.15	+ 46.94	- 14.69	+24 5 43.19
		E	...	22 47 43.5	2 16.9	54.20	50.30	...	14 49 24.40	+ 1.01	- 28.37	+ 14.68	
9	α Pegasi	E	...	22 57 13.0	2 50.0	55.70	50.45	...	24 13 31.55	+ 1.46	- 28.91	+ 24.96	+14 41 24.58
	June 22, L.	W	...	23 2 38.0	2 35.0	56.90	50.70	...	335 45 43.58	+ 1.89	+ 24.03	- 24.95	
10	α Ursæ Minoriss. p.	E	...	13 16 18.0	8 18.2	48.25	49.00	...	307 43 35.45	+ 0.15	- 2.80	-1 11.37	+88 47 27.52
		W	...	13 22 2.0	2 34.2	54.90	52.45	...	52 15 37.50	+ 3.53	+ 0.27	+1 11.40	
11	ζ Virginis	W	...	13 27 3.0	2 49.7	54.00	52.20	...	320 58 21.02	+ 3.12	+ 19.41	- 44.86	- 0 6 22.13
		E	...	13 32 11.0	2 18.3	51.55	49.85	...	39 0 43.30	+ 1.35	- 12.89	+ 44.87	
12	7 Boötis	E	...	13 47 28.0	2 43.4	56.65	53.25	...	20 2 15.08	+ 4.30	- 31.28	+ 20.25	+18 52 46.02
		W	...	13 52 31.0	2 19.6	55.30	51.90	...	339 57 0.80	+ 3.32	+ 22.83	- 20.25	
13	d Boötis	E	...	14 3 59.0	2 6.9	55.90	52.40	...	13 22 13.05	+ 3.68	- 26.66	+ 13.21	+25 32 50.74
		W	...	14 7 43.0	1 37.1	56.00	52.40	...	340 37 4.92	+ 3.75	+ 15.61	- 13.21	
14	θ Boötis	W	...	14 19 8.5	2 51.6	52.95	50.85	...	13 22 29.28	+ 2.16	- 33.02	+ 13.23	+52 17 51.58
		E	...	14 24 6.0	2 5.9	53.90	51.50	...	346 36 54.85	+ 2.76	+ 17.78	- 13.23	
15	56 B. Draconis	E	...	14 27 45.0	1 25.8	55.20	52.05	...	338 16 2.75	+ 3.43	+ 4.14	- 22.17	+60 39 6.84
		W	...	14 31 53.0	2 42.2	55.30	51.95	...	21 43 17.38	+ 3.36	- 14.78	+ 22.18	
16	Piazzi 166	W	2.5	14 38 2.0	2 47.5	53.70	51.05	...	300 19 26.70	+ 2.52	+ 12.89	-1 34.86	-20 46 13.49
		E	...	14 43 4.0	2 14.5	54.30	51.85	...	59 39 38.28	+ 3.08	- 8.31	+1 34.86	
17	381 G. Centauri	E	...	14 47 14.0	2 42.9	55.45	52.05	...	72 20 14.08	+ 3.39	- 9.86	+2 52.96	-33 28 6.25
		W	...	14 52 24.0	2 27.1	55.80	51.70	...	287 38 55.98	+ 3.34	+ 8.04	-2 52.97	
18	φ Boötis	W	...	14 57 25.5	2 59.3	53.35	50.80	...	348 22 55.78	+ 2.28	+1 0.24	- 11.45	+27 19 25.56
		E	...	15 2 54.0	2 29.2	54.10	51.00	...	11 35 57.10	+ 2.62	- 41.74	+ 11.44	
19	ι Serpentis	E	...	15 8 3.0	2 27.1	54.95	51.80	...	33 36 44.35	+ 3.17	- 16.51	+ 37.03	+ 5 17 46.72
		W	...	15 12 37.0	2 6.9	57.00	52.30	...	326 22 28.62	+ 3.02	+ 12.29	- 37.04	
20	ι Libræ	W	...	15 19 55.0	3 1.0	54.50	51.05	...	304 42 27.35	+ 2.67	+ 16.22	-1 20.32	-16 22 55.60
		E	...	15 25 18.0	2 22.0	53.45	50.90	...	55 16 38.12	+ 2.33	- 9.98	+1 20.33	

Time	Ther- 1904	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904 o.
<i>d h m</i>			<i>mm</i>	6 Instrument in meridian; W. observation at IX with movable thread, E. observation at IX with fixed thread.					<i>° ' "</i>	<i>"</i>
29 21 24	68.5							1	359 59 37.10	
21 15	68.1							2	380 24	
21 49	68.1	69.3	29.663					3	36.92	
22 0	67.8							4	38.48	
22 12	68.0							5	37.37	
22 28	67.6							6	38.50	1.47
22 46	67.4							7	37.18	
23 0	67.5	69.7	29.668					8	38.07	
23 11 19	71.0	75.1	29.819					9	36.80	
11 16	70.5							10	37.06	
11 59	69.5							11	37.66	
14 6	69.5							12	37.52	
14 21	69.1	71.6	29.814					13	37.18	
14 37	68.4							14	36.90	
14 51	68.5							15	38.14	13.54
15 0	68.5							16	37.58	15.76
15 11	68.3							17	37.48	18.10
15 22	67.9	70.1	29.808					18	38.14	
								19	37.92	
								20	38.10	

Notes.
 1-9 Very unsteady and diffuse.
 Clouds.
 10 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Coronæ Borealis	E	...	15 36	...	54.50	51.40	26.672	1 56 34.12	+ 3.57	+ 0.25	+ 1.92	+36 56 59.76
		W	...	...	...	57.00	52.20	26.672	358 0 3.18	+ 4.68	- 0.25	- 1.92	...
2	μ Serpentis	W	...	15 41 55.0	2 46.9	54.95	50.95	...	317 56 41.48	+ 2.74	+17.62	- 50.34	- 3 8 10.04
		E	...	15 46 43.0	2 1.1	52.90	50.65	...	42 2 22.12	+ 2.07	- 9.28	+ 50.35	...
3	49 Libræ	W	...	15 52 19.0	2 43.0	55.80	51.30	...	304 50 23.90	+ 3.10	+13.19	-1 20.08	-16 15 1.06
		E	...	15 57 26.0	2 24.0	52.90	50.80	...	55 8 43.95	+ 2.16	-10.29	+1 20.09	...
4	φ Herculis	E	...	16 6	...	53.90	50.90	26.521	353 42 28.90	+ 3.17	+ 0.34	- 6.15	+45 11 21.27
		W	...	...	...	57.70	52.00	26.521	6 14 24.65	+ 4.66	- 0.34	+ 6.15	...
5	τ Herculis	W	...	16 17	...	55.10	51.15	27.373	7 35 11.25	+ 2.17	- 0.36	+ 7.49	+46 32 41.83
		E	...	...	...	51.90	50.25	27.373	352 20 36.80	+ 0.90	+ 0.36	- 7.49	...
6	g Herculis	E	...	16 25	...	53.30	50.95	27.644	356 47 15.25	+ 3.09	+ 0.30	- 3.11	+42 5 44.65
		W	...	...	...	58.10	52.60	27.644	3 8 3.20	+ 5.15	- 0.30	+ 3.10	...
7	β Andromedæ	W	...	1 4	...	53.65	50.15	27.417	356 9 15.90	- 0.53	- 0.23	- 3.76	+35 6 36.71
		E	...	...	...	55.20	51.05	27.417	3 46 27.40	+ 0.25	+ 0.23	+ 3.76	...
8	α Ursæ Minoris	E	...	1 16 10.0	8 26.9	55.95	51.30	...	310 8 29.58	+ 1.29	+ 3.01	-1 6.88	+88 47 25.86
		W	...	1 20 32.0	4 4.9	56.90	51.55	...	49 50 37.20	+ 1.66	- 0.70	+1 6.88	...
9	α Ursæ Minoris	W	...	1 23 52.0	0 44.9	56.10	51.00	...	49 50 37.30	+ 1.18	- 0.02	+1 6.83	+88 47 26.08
		E	...	1 28 2.0	3 25.1	55.00	50.75	...	310 8 32.32	+ 0.78	+ 0.49	-1 6.79	...
10	June 23, L. Ursæ Minoris S. P.	W	...	13 16 11.0	8 26.6	54.45	51.95	...	52 15 34.80	+ 1.94	+ 2.90	+1 11.81	+88 47 28.00
		E	...	13 21 14.0	3 23.6	54.10	51.70	...	307 43 31.72	+ 1.71	- 0.47	-1 11.84	...
11	ζ Virginis	E	...	13 27 5.0	2 47.9	55.70	53.25	...	39 0 46.25	+ 2.85	-19.00	+ 45.12	- 0 6 22.18
		W	...	13 32 12.0	2 19.1	53.95	51.55	...	320 58 27.75	+ 1.54	+13.04	- 45.15	...
12	η Ursæ Majoris	W	...	13 41 11.0	2 38.8	51.15	50.75	...	10 52 24.90	+ 0.45	-36.60	+ 10.75	+49 47 41.90
		E	...	13 46 23.0	2 33.2	55.05	52.40	...	349 6 43.82	+ 2.24	+34.06	- 10.75	...
13	d Boötis	W	...	14 3 16.0	2 50.1	53.55	51.85	...	346 36 35.62	+ 1.60	+47.86	- 13.33	+25 32 51.85
		E	...	14 8 24.0	2 17.9	54.75	52.30	...	13 22 17.78	+ 2.10	-31.48	+ 13.33	...
14	52 Hydræ	E	...	14 20 4.0	2 34.6	55.90	52.55	...	67 56 26.92	+ 2.53	- 9.56	+2 17.46	-29 3 44.72
		W	...	14 25 30.0	2 51.4	56.00	52.20	...	292 2 37.62	+ 2.38	+11.75	-2 17.52	...
15	c ¹ Centauri	W	...	14 35 10.0	2 42.9	53.50	51.05	...	286 21 30.75	+ 1.24	+ 9.64	-3 8.50	-34 45 45.62
		E	...	14 40 16.0	2 23.1	54.40	51.55	...	73 37 35.25	+ 1.72	- 7.44	+3 8.51	...
16	381 G. Centauri	W	...	14 47 0.0	2 57.1	54.90	51.80	...	287 37 27.05	+ 1.06	+11.65	-2 54.32	-33 28 5.08
		E	...	14 52 28.0	2 30.9	54.70	51.75	...	72 20 10.28	+ 1.81	- 8.46	+2 54.34	...
17	ψ Boötis	E	...	14 57 36.5	2 48.4	55.40	51.80	...	11 36 5.18	+ 2.12	-53.15	+ 11.54	+27 19 26.51
		W	...	15 2 59.0	2 34.1	56.75	52.15	...	348 23 9.48	+ 2.58	+44.51	- 11.54	...
18	3 Serpentis	W	...	15 7 38.0	2 52.3	54.90	51.90	...	326 22 19.72	+ 1.94	+22.65	- 37.36	+ 5 17 47.57
		E	...	15 13 7.0	2 36.7	53.75	51.00	...	33 36 45.62	+ 1.23	-18.74	+ 37.38	...
19	32 Libræ	E	...	15 20 12.0	2 44.2	55.40	52.00	...	55 16 37.80	+ 2.13	-13.35	+1 21.02	-16 22 55.00
		W	...	15 25 26.0	2 29.8	56.55	52.15	...	304 42 31.35	+ 2.49	+11.11	-1 21.04	...
20	ζ Coronæ Borealis	W	...	15 36	...	55.35	51.75	26.087	358 0 31.15	+ 1.26	- 0.25	- 1.94	+36 57 1.11
		E	...	...	...	54.65	50.75	26.087	1 56 58.88	+ 0.61	+ 0.25	+ 1.94	...

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
22 15 45	67.4	...	...	1.4.6. Instrument in meridian, observation at I with movable thread.	1	359 59 37.18	-10.37
15 55	67.3	...	...	5.7.20. Instrument in meridian, observation at IX with movable thread.	2	38.48	...
16 4	66.8	...	...	16 W. Instrument in meridian, observation assumed as with movable thread at 27.000 rev.	3	38.01	...
16 15	66.6	...	...		4	38.93	...
16 29	66.6	69.1	29.906		5	38.59	...
1 2	64.9	66.1	30.051		6	37.44	-11.34
1 19	64.6	...	...		7	36.34	...
1 31	65.6	66.3	30.052		8	36.02	...
23 13 19	72.8	76.3	30.113		9	36.04	...
13 30	72.4	...	...		10	36.28	...
13 44	70.6	...	...		11	36.20	...
14 6	70.1	...	...		12	34.44	...
14 23	69.2	71.7	30.114		13	36.74	...
14 38	69.2	...	...		14	35.79	+ 9.36
14 50	69.0	...	...		15	35.68	+ 9.49
15 1	68.9	...	...		16	36.06	+ 8.13
15 11	68.1	...	...		17	35.36	...
15 23	67.8	69.8	30.123		18	35.22	...
15 32	67.5	...	...		19	35.76	...
					20	36.46	-10.61

Note.
15. Very unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	μ Serpentis	E	...	15 41 50.0	2 46.1	55.45	51.60	.....	42 2 26.70	+ 1.93	-17.45	+ 50.79	- 3 8 9.28
		W	...	15 47 6.0	2 23.9	56.90	52.20	.....	317 56 44.85	+ 2.61	+13.10	- 50.83	
2	γ Herculis	W	...	15 54 2.0	2 58.8	54.20	51.10	.....	339 9 11.08	+ 1.41	+36.25	- 21.49	+18 5 8.04
		E	...	15 59 25.0	2 24.2	54.10	51.20	.....	20 49 45.45	+ 1.48	-23.58	+ 21.49	
3	ν Scorpii	E	...	16 3 45.0	2 45.9	54.75	51.20	.....	58 6 12.52	+ 1.54	-12.99	+1 30.48	-19 12 38.77
		W	...	16 9 5.0	2 34.1	57.05	52.25	.....	301 52 56.92	+ 2.69	+11.20	-1 30.48	
4	γ Herculis	W	...	16 14 58.5	2 48.1	54.55	51.10	.....	340 26 54.88	+ 1.49	+33.81	- 20.04	+19 22 51.56
		E	...	16 20 2.0	2 15.4	52.95	50.45	.....	19 32 1.78	+ 0.83	-21.94	+ 20.04	
5	β Herculis	E	...	16 23 39.0	2 32.1	54.20	51.80	.....	17 13 1.60	+ 1.75	-30.81	+ 17.50	+21 42 3.45
		W	...	16 28 47.0	2 35.9	57.75	52.55	.....	312 46 5.30	+ 3.08	+32.37	- 17.49	
6	α Ursæ Minoris	W	...	1 14 49.0	9 49.2	56.05	51.70	.....	49 50 42.00	+ 0.14	- 4.06	+1 6.97	+88 47 27.23
		E	...	1 20 30.0	4 8.2	56.05	51.80	.....	310 8 30.30	+ 0.18	+ 0.72	-1 6.93	
7	α Ursæ Minoris	E	...	1 25 5.0	0 26.8	57.00	52.40	.....	310 8 32.15	+ 0.72	+ 0.01	-1 6.90	+88 47 26.07
		W	...	1 31 17.0	6 38.8	56.45	51.60	.....	49 50 39.28	+ 0.19	- 1.86	+1 6.83	
8	June 25, L. α Ursæ Minoris S. P.	W	...	13 29 36.0	4 55.8	53.10	51.50	.....	52 15 39.88	+ 3.58	+ 0.99	+1 9.89	+88 47 27.40
		E	...	13 33 58.0	9 17.8	48.60	50.45	.....	307 43 34.32	+ 1.93	- 3.52	-1 9.89	
9	γ Ursæ Majoris	E	...	13 41 14.3	2 35.9	47.40	48.85	.....	349 6 45.75	+ 0.81	+35.28	- 10.43	+49 47 43.52
		W	...	13 46 47.5	2 57.3	51.65	52.05	.....	10 52 36.50	+ 3.45	-45.62	+ 10.44	
10	π Hydræ	W	...	13 58 43.0	2 17.1	49.30	49.40	.....	294 52 47.30	+ 1.55	+ 7.88	-1 56.51	-26 13 20.34
		E	...	14 3 34.0	2 33.9	49.35	50.50	.....	65 6 25.82	+ 2.10	- 9.94	+1 56.62	
11	α Boötis	E	...	14 8 35.0	2 47.2	49.75	50.45	.....	19 14 6.20	+ 2.23	-33.89	+ 19.02	+19 40 59.42
		W	...	14 13 48.3	2 26.1	48.95	49.00	.....	340 45 10.58	+ 1.27	+25.88	- 19.03	
12	δ Hydræ	W	...	14 21 0.0	1 39.0	47.00	48.35	.....	292 2 43.50	+ 0.45	+ 3.92	-2 13.55	-29 3 45.04
		E	...	14 26 41.0	4 2.0	49.35	49.55	.....	67 56 46.28	+ 1.64	-23.43	+2 13.61	
13	δ Boötis	E	...	14 35 .....	.....	51.90	50.85	26.487	354 4 30.62	+ 3.65	+ 0.34	- 5.65	+44 49 18.37
		W	...	.....	.....	51.05	49.30	26.487	5 52 24.05	+ 2.64	- 0.34	+ 5.05	
14	δ B. Draconis	W	...	14 47 20.0	1 45.2	47.20	47.50	.....	20 45 21.35	+ 0.10	- 6.68	+ 20.73	+59 41 15.41
		E	...	14 51 11.0	2 5.8	49.50	49.45	.....	339 13 47.88	+ 1.66	+ 9.56	- 20.73	
15	δ Boötis (<i>n. fol.</i>)	E	...	15 1 .....	.....	50.55	49.45	27.468	350 51 18.78	+ 2.63	+ 0.37	- 8.77	+48 1 53.19
		W	...	.....	.....	50.95	49.15	27.468	9 4 14.75	+ 2.55	- 0.37	+ 8.77	
16	μ Boötis	W	...	15 21 .....	.....	48.60	47.90	26.010	358 46 33.65	- 0.11	- 0.26	- 1.15	+37 42 59.20
		E	...	.....	.....	50.55	50.00	26.010	1 11 4.58	+ 1.44	+ 0.26	+ 1.15	
17	δ H. Scorpii	E	...	15 28 37.0	2 41.1	52.60	49.95	.....	66 41 58.10	+ 2.60	-10.60	+2 6.47	-27 49 4.21
		W	...	15 33 46.0	2 27.9	52.65	49.25	.....	293 17 9.78	+ 2.32	+ 8.94	-2 6.50	
18	β Serpentis	W	...	15 39 9.0	2 42.1	50.25	48.50	.....	336 47 40.50	+ 1.37	+27.25	- 23.49	+15 43 25.94
		E	...	15 44 9.0	2 17.9	49.10	48.35	.....	23 11 22.68	+ 1.00	-19.72	+ 23.49	
19	γ Herculis	E	3.5	15 54 7.5	2 53.7	51.45	49.35	.....	20 49 55.70	+ 2.10	+34.21	+ 20.89	+18 5 8.13
		W	...	15 59 17.5	2 16.3	53.80	49.55	.....	339 9 24.10	+ 2.77	+21.07	- 20.89	

Time	Ther- m.	Alt- ther	Barom	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>s</i>		<i>m</i>				
23 15 47	66.8			11.15 Instrument in meridian, observation at I with movable thread.	1	359 59 35.85	
15 16	66.2			16 Instrument in meridian, observation at IX with movable thread.	2	36.04	- 7.69
16 7	66.2				3	35.94	
16 14	66.2				4	35.42	
16 22	66.6	68.3	30-124		5	36.65	
1 13	65.6	66.8	30-108		6	34.66	
1 34	65.0	68.3	30-103		7	35.71	
20 13 21	81.6	82.6	29.915		8	38.59	
13 37	83.8				9	38.09	
13 44	82.6			6.12 Faint	10	37.41	
14 1	81.6			Clouds.	11	36.11	
14 11	80.3			19 E. One microscope reading increased 30".	12	36.21	+ 9.18
14 21	80.1			Very unsteady	13	37.11	
14 32	78.6	81.9	29.894	Very diffuse	14	36.93	
14 44	78.6				15	36.26	12.60
15 18	72.6				16	37.15	
15 31	72.6	80.1	29.902		17	35.60	+ 3.26
15 42	70.1				18	36.64	
16 11	76.8				19	35.76	- 8.07

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Scorpii	W E	...	16 4 15.0 16 8 54.0	2 16.2 2 22.8	51.80 49.70	48.80 48.50	...	301 52 59.35 58 6 12.50	+ 1.87 + 1.18	+ 8.75 - 9.62	- 1 27.91 + 1 27.90	- 19 12 38.10
2	γ Herculis	E W	...	16 14 37.0 16 19 45.0	3 9.9 1 58.1	50.50 53.40	48.20 49.45	...	19 32 23.40 340 27 10.42	+ 1.23 + 2.61	- 43.14 + 16.69	+ 19.48 - 19.48	+ 19 22 51.49
3	β Herculis	W E	...	16 23 53.7 16 28 8.0	2 17.7 1 56.6	51.30 49.55	48.75 48.35	...	342 46 15.12 17 12 50.25	+ 1.71 + 1.09	+ 25.25 - 18.10	- 17.02 + 17.03	+ 21 42 4.25
4	July 1, L. α Ursæ Minoris	W E	2.5	1 19 16.0 1 23 35.0	5 31.6 2 12.6	54.40 55.30	50.10 50.90	...	49 50 38.72 310 8 32.12	+ 0.17 + 0.79	- 1.29 + 0.06	+ 1 6.64 - 1 6.59	+ 88 47 25.78
5	α Ursæ Minoris	E W	2.5	1 27 36.0 1 32 4.0	2 48.4 7 16.4	55.30 55.40	50.95 50.85	...	310 8 31.18 49 50 39.68	+ 0.82 + 0.80	+ 0.33 - 2.22	- 1 6.56 + 1 6.51	+ 88 47 26.35
6	July 2, L. α Ursæ Minoris S. P.	W E	3	13 16 22.0 13 21 34.0	8 26.0 3 14.0	53.20 50.55	50.95 49.75	...	52 15 36.42 307 43 33.10	+ 1.69 + 0.43	+ 2.89 - 0.42	+ 1 11.68 - 1 11.70	+ 88 47 27.51
7	α Ursæ Minoris S. P.	E W	3	13 25 26.0 13 31 22.0	0 38.0 6 34.0	50.80 53.75	49.60 51.25	...	307 43 32.38 52 15 37.42	+ 0.41 + 1.98	- 0.02 + 1.75	- 1 11.71 + 1 11.76	+ 88 47 27.23
8	η Ursæ Majoris	W E	...	13 41 36.5 13 46 22.5	2 14.4 2 31.6	51.65 53.25	49.95 51.15	...	10 52 17.42 349 6 43.75	+ 0.78 + 1.78	- 26.22 + 33.37	+ 10.70 - 10.70	+ 49 47 44.09
9	π Hydræ	E W	...	13 59 24.0 14 3 48.0	1 36.9 2 47.1	55.50 55.55	52.00 51.45	...	65 6 16.15 294 52 42.60	+ 2.76 + 2.50	- 3.94 + 11.71	+ 1 59.51 - 1 59.59	- 26 13 21.78
10	α Boötis	W E	...	14 8 36.0 14 13 56.0	2 47.0 2 33.0	52.65 53.30	50.10 50.50	...	340 45 4.42 19 14 0.55	+ 1.11 + 1.49	+ 33.81 - 28.39	- 19.48 + 19.48	+ 19 41 0.21
11	ρ Boötis	E W	...	14 28 .... .....	..... .....	55.00 55.25	51.25 50.80	27.338	8 5 18.28 351 52 5.60	+ 3.01 + 2.86	+ 0.20 - 0.20	+ 7.98 - 7.98	+ 30 47 41.45
12	33 Boötis	W E	...	14 35 .... .....	..... .....	53.70 54.05	50.20 50.75	26.333 26.333	5 52 33.08 354 4 37.45	+ 0.68 + 1.05	- 0.34 + 0.34	+ 5.79 - 5.79	+ 44 49 19.93
13	61 B. Draconis	E W	...	14 46 26.0 14 51 29.0	2 39.9 2 23.1	56.60 54.65	51.95 50.70	...	339 13 39.55 20 45 25.42	+ 3.03 + 1.92	+ 15.44 - 12.37	- 21.26 + 21.26	+ 59 41 16.59
14	δ Boötis (<i>n. fol.</i>)	W E	...	15 1 .... .....	..... .....	53.30 53.70	50.30 50.50	26.247 26.247	9 5 7.10 350 52 9.58	+ 0.64 + 0.87	- 0.37 + 0.37	+ 9.00 - 9.00	+ 48 1 54.13
15	μ Boötis	E W	...	15 21 .... .....	..... .....	56.55 55.45	52.10 50.75	26.813 26.813	1 10 27.12 358 45 58.70	+ 3.80 + 2.89	+ 0.26 - 0.26	+ 1.18 - 1.18	+ 37 43 0.75
16	γ Libræ	W E	...	15 27 30.0 15 33 14.0	2 46.3 2 57.7	53.55 54.05	49.95 50.70	...	306 37 9.92 53 22 2.52	+ 1.27 + 1.78	+ 14.15 - 16.16	- 1 15.37 + 1 15.39	- 14 28 9.93
17	β Serpentis	E W	3.5	15 39 28.5 15 44 29.0	2 23.5 2 37.0	55.80 55.55	51.00 50.55	...	23 11 21.00 336 47 41.55	+ 2.35 + 2.07	- 21.35 + 25.56	+ 24.07 - 24.08	+ 15 43 26.37
18	ϵ Coronæ Borealis	W E	...	15 51 1.5 15 56 12.0	2 41.7 2 28.8	52.50 52.80	49.30 49.95	...	348 13 13.58 11 45 50.50	+ 0.68 + 1.10	+ 48.41 - 40.98	- 11.72 + 11.72	+ 27 9 31.15
19	κ Herculis	E W	...	16 1 13.0 16 6 27.0	2 38.0 2 36.0	54.00 55.65	50.25 50.70	...	21 36 37.68 338 22 31.02	+ 1.52 + 2.14	- 27.45 + 26.76	+ 22.28 - 22.28	+ 17 18 18.65
20	23 Herculis	W E	...	16 19 .... .....	..... .....	53.00 51.95	49.45 49.55	25.813 25.813	353 37 22.40 6 20 31.40	+ 0.16 - 0.08	- 0.22 + 0.22	- 6.27 + 6.27	+ 32 33 35.98

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>								<i>° ' "</i>	<i>"</i>
25 16 7	77.1	...	...	Instrument in meridian, E. observation at I with movable thread; W. observation at I						1	359 59 37.01	...
16 17	77.2	...	...	with fixed thread.						2	359 59 35.60	...
16 31	76.2	78.9	29.904	Instrument in meridian, observation at IX with movable thread.						3	37.66	...
1 1 20	63.6	...	...	Instrument in meridian, observation at I with movable thread.						4	35.31	...
1 35	64.6	66.3	29.868							5	35.27	...
2 13 19	71.6	...	...							6	37.04	...
13 35	71.1	74.3	29.986							7	36.98	...
13 45	71.3	...	...							8	35.44	...
14 2	70.2	...	...							9	35.85	...
14 11	70.0	...	...							10	36.50	...
14 26	69.4	...	...							11	35.68	...
14 39	68.1	...	...							12	36.69	...
14 49	67.8	70.1	30.008							13	36.50	...
15 4	67.5	...	...							14	36.14	- 13.07
15 31	67.5	...	...							15	36.42	...
15 42	66.9	68.8	30.024							16	36.75	...
15 54	66.5	...	...							17	35.58	...
16 4	66.6	...	...							18	36.64	...
16 17	66.8	...	...							19	35.84	...
										20	36.26	- 12.37

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	A Draconis	E W		16 25 46.0 16 30 57.0	2 30.8 2 40.2	53.50 53.65	50.00 50.75		329 56 30.02 30 2 41.88	+ 1.25 + 2.18	+ 6.91 - 7.80	- 32.52 + 32.53	+68 58 48.41
2	114 B. Draconis	W E		16 40 47.5 16 46 10.0	2 47.8 2 34.7	..... 52.60	..... 49.80	.....	18 1 47.32 341 57 25.50	+ 1.55 + 0.96	-21.03 +17.88	+ 18.33 - 18.34	+56 57 26.93
3	July 3, L. α Ursæ Minoris	E W		1 20 12.0 1 24 14.0	4 37.1 0 35.1	54.20 54.45	50.10 49.90	.....	310 8 30.98 49 50 38.30	+ 0.49 + 0.46	+ 0.90 - 0.01	-1 6.85 +1 6.82	+88 47 26.87
4	α Ursæ Minoris	W E	4	1 27 43.0 1 31 46.0	2 53.9 6 56.9	53.95 54.50	49.55 50.20	.....	49 50 39.55 310 8 31.02	+ 0.16 + 0.62	- 0.35 + 2.03	+1 6.80 -1 6.77	+88 47 26.48
5	July 6, L. α Ursæ Minoris	E W		1 14 0.0 1 19 5.0	10 51.0 5 46.0	54.15 56.40	50.25 51.05	.....	310 8 25.80 49 50 39.30	+ 0.44 + 1.40	+ 4.94 - 1.40	-1 5.39 +1 5.36	+88 47 26.29
6	α Ursæ Minoris	W E		1 23 26.0 1 28 20.0	1 25.0 3 29.0	55.55 53.40	50.75 50.15	.....	49 50 38.52 310 8 30.90	+ 1.04 + 0.20	- 0.08 + 0.51	+1 5.33 -1 5.30	+88 47 26.10
7	July 7, L. α Ursæ Minoris	E W		1 15 10.0 1 20 52.0	9 42.1 4 0.1	56.05 54.80	51.15 50.30	.....	310 8 25.85 49 50 38.72	+ 0.98 + 0.25	+ 3.95 - 0.67	-1 5.45 +1 5.42	+88 47 26.06
8	α Ursæ Minoris	W E		1 25 10.0 1 29 47.0	0 17.9 4 54.9	54.70 55.20	50.40 50.60	.....	49 50 38.35 310 8 28.78	+ 0.28 + 0.49	0.00 + 1.02	+1 5.39 -1 5.37	+88 47 26.41
9	July 10, L. α Piscis Australis	W E		22 49 30.0 22 54 47.0	2 55.8 2 21.2	46.35 50.30	48.00 50.00	.....	290 59 0.50 69 0 3.32	+ 0.65 + 2.70	+12.15 - 7.84	-2 22.93 +2 22.93	-30 7 28.51
10	5 H ¹ . Cassiopeia	E W		23 5 51.0 23 11 18.5	2 54.9 2 32.6	51.35 47.85	50.50 48.70	.....	342 16 27.25 17 42 33.50	+ 3.12 + 1.34	+23.45 -17.86	- 17.67 + 17.67	+56 38 16.11
11	6 ¹ Aquarii	W E		23 15 7.0 23 20 19.0	2 53.5 2 18.5	..... 50.50	..... 49.95	.....	300 28 29.75 59 30 33.55	+ 0.99 + 2.63	+13.87 - 8.84	-1 33.63 +1 33.63	-20 37 8.14
12	6 ³ Aquarii	E W		23 25 32.0 23 30 49.0	2 47.9 2 29.1	51.15 48.65	50.10 48.85	.....	60 19 47.20 299 39 20.65	+ 2.94 + 1.67	-12.81 +10.10	+1 36.76 -1 36.76	-21 26 22.36
13	ψ Andromedæ	W E		23 41 ..... .....	..... .....	47.20 50.10	48.05 49.70	26.257 26.257	6 56 28.18 353 0 47.68	+ 0.13 + 1.70	- 0.35 + 0.35	+ 6.76 - 6.76	+45 53 12.74
14	ψ Pegasi	E W		23 50 30.5 23 55 18.5	2 27.5 2 20.5	51.40 49.05	50.30 48.90	.....	14 18 35.42 345 40 32.15	+ 3.03 + 1.74	-33.95 +30.80	+ 14.12 - 14.12	+24 36 32.84
15	α Andromedæ	W E		0 2 9.5 0 5 46.0	1 21.0 2 15.5	46.50 49.20	47.90 49.10	.....	349 37 54.95 10 21 38.50	+ 0.68 + 1.93	+13.60 -38.05	- 10.12 + 10.12	+28 33 40.16
16	γ Ceti	E W		0 13 30.0 0 18 13.0	1 6.7 3 36.3	51.20 49.20	50.10 48.90	.....	48 14 57.38 311 43 46.52	+ 2.91 + 1.84	- 2.50 +26.24	+1 1.90 -1 1.92	- 9 21 6.64
17	β Ceti	E W		0 36 16.0 0 43 27.0	2 34.5 4 36.5	50.05 47.85	49.50 48.10	.....	57 24 7.88 302 34 30.90	+ 2.26 + 1.04	-11.40 +36.50	+1 26.23 -1 26.23	-18 30 31.52
18	β Andromedæ	E W		1 4 ..... .....	..... .....	48.25 47.40	48.45 47.90	26.088 26.088	3 47 17.42 356 10 10.45	+ 2.09 + 2.39	+ 0.23 - 0.92	+ 3.68 - 3.68	+35 6 39.27

Time.	Ther (88)	Att ther	Barom	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1904.0
2 4 41	66.6		30.046	1. Instrument in meridian, observation at IX with movable thread	1	349 59 37.22	.....
2 16 29	66.6	68.6	30.046	12. Instrument in meridian, E. observation at I. W. observation at I. 25' with movable thread	2	36.08	.....
3 1 20	66.6				3	35.54	.....
3 1 26	66.6				4	36.53	.....
3 1 32	66.7	67.3	30.057		5	35.22	.....
3 1 41	66.8	73.8	29.964		6	35.56	.....
3 1 49	66.8	74.9	29.969		7	34.52	.....
3 1 54	66.8	73.1	29.987		8	34.47	.....
3 1 56	66.8	74.5	29.989		9	35.74	.....
3 2 2	66.8	72.2	29.998		10	35.40	.....
3 2 9	66.6			2 W, 11 W. Level correction assumed.	11	35.98	20.12
3 2 18	66.6			Very faint, clouds.	12	34.88	20.14
3 2 28	66.6			Unsteady.	13	36.10	+ 1.21
3 2 37	66.6	71.2	29.961	Micrometer reading increased 1 rev.	14	34.60	- 4.44
3 2 51	66.4			Clouds.	15	35.80	.....
3 3 12	66.5				16	36.18	.....
3 3 21	66.5				17	36.59	.....
3 3 32	66.6				18	36.37	.....
3 3 39	66.9						
3 3 57	66.0	71.1	29.958				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris	W	...	1 16 58.0	7 57.5	45.55	47.10	...	49 50 43.32	- 0.02	- 2.67	+1 5.33	+88 47 26.36
		E	...	1 21 2.0	3 53.5	47.40	48.00	...	310 8 30.75	+ 0.88	+ 0.64	-1 5.31	
2	α Ursæ Minoris	E	...	1 24 16.0	0 39.5	47.65	48.10	...	310 8 30.82	+ 0.99	+ 0.02	-1 5.30	+88 47 26.58
	July 11, L.	W	...	1 28 27.0	3 31.5	46.25	47.65	...	49 50 40.78	+ 0.43	- 0.52	+1 5.28	
3	δ Boötis (<i>n. fol.</i>)	E	...	15 1	...	50.45	49.05	27.448	350 51 19.30	+ 1.43	+ 0.37	- 8.79	+48 1 55.42
		W	...	...	...	50.50	48.15	27.448	9 4 20.05	+ 0.95	- 0.37	+ 8.79	
4	δ Boötis	W	...	15 12	...	49.95	48.40	27.529	354 43 12.95	- 0.48	- 0.22	- 5.03	+33 40 34.60
		E	...	...	...	50.40	49.05	27.529	5 12 26.58	- 0.08	+ 0.22	+ 5.03	
5	ν^1 Boötis	E	...	15 27	...	52.85	49.80	25.866	357 44 21.88	+ 2.36	+ 0.29	- 2.15	+41 9 50.76
		W	...	...	...	53.70	49.75	25.866	2 13 25.72	+ 2.60	- 0.29	+ 2.15	
6	ϵ Serpentis	W	...	15 34 33.5	2 47.4	51.40	48.65	...	341 3 1.38	+ 0.73	+34.42	- 18.82	+19 58 56.06
		E	...	15 39 32.0	2 11.1	51.05	49.10	...	18 56 0.70	+ 0.91	-21.12	+ 18.83	
7	ρ Scorpii	E	...	15 48 50.0	2 12.9	52.60	49.30	...	67 48 49.95	+ 1.33	- 7.08	+2 13.61	-28 56 3.62
		W	...	15 53 26.0	2 23.1	56.40	51.05	...	292 10 19.12	+ 3.14	+ 8.21	-2 13.63	
8	κ Herculis	W	...	16 1 16.3	2 33.1	54.25	50.15	...	338 22 35.18	+ 2.16	+25.78	- 21.75	+17 18 19.97
		E	...	16 5 55.0	2 5.6	51.50	49.20	...	21 36 29.75	+ 0.99	-17.35	+ 21.76	
9	α Herculis	E	...	16 19	...	53.30	49.00	27.653	6 19 12.48	+ 2.11	+ 0.22	+ 6.13	+32 33 38.48
		W	...	...	...	57.80	51.35	27.653	353 36 6.08	+ 4.44	- 0.22	- 6.13	
10	Δ Draconis	W	...	16 25 4.5	3 10.4	57.40	51.00	...	30 2 48.62	+ 3.39	-11.01	+ 31.79	+68 58 51.46
		E	...	16 31 13.0	2 58.1	52.15	48.75	...	329 56 24.80	+ 0.93	+ 9.64	- 31.78	
11	α Ophiuchi	E	...	16 41 8.0	2 51.5	53.55	49.20	...	63 21 32.80	+ 1.55	-12.70	+1 49.03	-24 28 16.29
		W	...	16 46 36.0	2 36.5	58.20	51.50	...	296 37 38.95	+ 3.87	+10.58	-1 49.02	
12	β Ophiuchi	W	...	16 53 3.0	3 2.3	57.85	51.30	...	317 0 13.80	+ 3.72	+20.63	- 51.17	- 4 4 34.78
		E	...	16 58 7.5	2 2.2	52.45	49.00	...	42 58 47.20	+ 1.15	- 9.27	+ 51.17	
13	Δ Ophiuchi (<i>mean</i>)	E	...	17 6 28.0	3 4.4	54.20	49.70	...	65 20 45.22	+ 1.93	-14.21	+1 59.19	-26 27 37.45
		W	...	17 11 46.0	2 13.6	59.95	52.30	...	294 38 30.60	+ 4.65	+ 7.46	-1 59.20	
14	δ Ophiuchi	W	...	17 17 44.0	2 52.2	58.05	51.60	...	297 0 44.52	+ 3.85	+12.89	-1 47.36	-24 5 7.82
		E	...	17 22 58.0	2 21.8	53.45	49.30	...	62 58 23.12	+ 1.53	- 8.74	+1 47.36	
15	ν^2 Draconis	E	...	17 27 43.0	2 44.8	54.05	49.55	...	343 40 11.68	+ 1.89	+23.37	- 16.11	+55 14 33.82
		W	...	17 32 46.0	2 18.2	60.00	52.35	...	16 18 50.38	+ 4.70	-16.44	+ 16.11	
16	α Herculis	W	...	17 47	...	58.05	51.85	26.547	9 28 26.80	+ 3.22	- 0.38	+ 9.22	+48 25 27.30
	July 12, L.	E	...	...	...	53.45	49.40	26.547	350 28 25.98	+ 0.85	+ 0.38	- 9.22	
17	α Ursæ Minoris	W	...	1 16 52.0	8 5.4	58.95	51.25	...	49 50 40.52	+ 1.27	- 2.75	+1 6.24	+88 47 25.94
		E	...	1 21 2.0	3 55.4	56.70	50.00	...	310 8 32.65	+ 0.08	+ 0.65	-1 6.25	
18	α Ursæ Minoris	E	...	1 24 17.0	0 40.4	56.85	50.15	...	310 8 33.25	+ 0.20	+ 0.02	-1 6.25	+88 47 25.98
	July 13, L.	W	...	1 29 3.0	4 5.6	59.75	51.35	...	49 50 38.40	+ 1.52	- 0.71	+1 6.25	
19	α Ursæ Minoris S. P.	W	...	13 20 50.0	4 7.9	55.10	51.40	...	52 15 40.28	+ 3.06	+ 0.70	+1 10.80	+88 47 27.42
		E	...	13 24 47.0	0 10.9	50.70	48.70	...	307 43 33.60	+ 0.61	0.00	-1 10.81	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
10 1 19	70.8	...	...	3, 5, 9. Instrument in meridian, observation at I with movable thread.	1	359 50 36.46	...
1 31	71.1	72.3	29.715	4, 16. Instrument in meridian, observation at IX with movable thread.	2	36.25	...
11 14 59	72.5	75.8	29.625		3	36.96	-15.15
15 9	72.6	...	...		4	38.88	...
15 25	72.5	...	...		5	37.77	...
15 37	72.2	...	...		6	38.52	-10.24
15 51	72.2	...	...		7	37.32	+ 2.22
16 4	71.8	73.7	29.617		8	38.26	...
16 17	71.1	...	...		9	37.02	-14.31
16 28	71.3	...	...		10	38.19	...
16 44	71.5	...	...		11	37.53	- 3.37
16 56	71.5	73.1	29.618	Notes.	12	38.62	...
17 9	70.8	...	...	3, 4, 12. Unsteady.	13	37.82	...
17 21	71.0	...	...	11. Poor; very faint and diffuse.	14	38.58	...
17 31	70.8	...	...	16. Very faint.	15	37.79	-16.99
17 49	70.1	72.2	29.622		16	37.72	-16.37
12 1 16	62.3	64.0	29.621		17	36.20	...
1 32	62.3	63.8	29.626		18	36.34	...
13 13 23	74.8	...	...		19	39.12	...

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris s. p.	E	...	13 27 38.0	2 40.1	50.10	48.20	...	307 43 33.58	+ 0.21	- 0.29	-1 10.83	+88 47 27.05
		W	...	13 31 36.0	6 38.1	56.50	51.75	...	52 15 38.62	+ 3.58	+ 1.79	+1 10.86	
2	γ Ursæ Majoris	E	...	13 41 6.0	2 42.9	55.10	50.95	...	349 6 40.38	+ 2.78	+38.52	- 10.56	+49 47 44.40
		W	...	13 46 24.0	2 35.1	54.50	50.30	...	19 52 28.25	+ 2.30	-34.92	+ 10.56	
3	α Boötis	E	...	14 8 20.0	3 1.0	57.55	51.55	...	19 14 10.65	+ 3.66	-39.72	+ 19.21	+19 41 0.63
		W	...	14 13 31.5	2 10.5	57.95	51.20	...	340 45 16.25	+ 3.65	+20.65	- 19.21	
4	ρ Boötis	W	...	14 28	...	55.50	50.45	26.046	351 51 22.58	+ 1.94	- 0.20	- 7.87	+30 47 43.16
		E	...	...	...	55.15	50.85	26.046	8 6 13.80	+ 1.99	+ 0.20	+ 7.87	
5	α Libræ	E	...	14 43 5.0	2 33.8	58.40	51.30	...	54 32 23.35	+ 3.76	-11.86	+1 17.45	-15 38 37.58
		W	...	14 47 57.0	2 18.2	58.85	51.65	...	305 26 47.68	+ 4.07	+ 9.58	-1 17.52	
6	δ Boötis (<i>n. fol.</i>)	W	...	15 1	...	56.85	51.20	26.133	9 5 13.55	+ 2.65	- 0.37	+ 8.89	+48 1 55.24
		E	...	...	...	56.35	51.55	26.133	350 52 13.85	+ 2.63	+ 0.37	- 8.89	
7	δ Boötis	E	...	15 12	...	57.65	51.75	26.145	5 13 18.22	+ 4.58	+ 0.22	+ 5.09	+33 40 34.44
		W	...	...	...	59.55	52.40	26.145	354 44 3.15	+ 5.43	- 0.22	- 5.09	
8	ν^1 Boötis	W	...	15 27	...	58.00	51.40	27.211	2 12 31.82	+ 2.99	- 0.29	+ 2.18	+41 9 51.25
		E	...	...	...	57.80	51.60	27.211	357 43 26.72	+ 3.09	+ 0.29	- 2.18	
9	ϵ Serpentis	E	...	15 34 30.7	2 50.1	59.75	52.50	...	18 56 9.28	+ 4.69	-35.54	+ 19.11	+19 58 56.81
		W	...	15 39 27.5	2 6.7	60.55	52.45	...	341 3 11.92	+ 4.92	+19.72	- 19.12	
10	ρ Scorpii	W	...	15 48 7.0	2 55.8	57.50	51.35	...	292 10 18.65	+ 3.56	+12.39	-2 15.92	-28 56 2.34
		E	...	15 52 37.0	1 34.2	57.30	51.50	...	67 48 41.08	+ 3.61	- 3.56	+2 15.96	
11	ω^3 Scorpii	E	...	15 59 12.0	2 39.8	59.10	52.10	...	59 29 59.88	+ 4.43	-11.77	+1 34.47	-20 36 32.96
		W	...	16 3 44.0	1 52.2	59.25	51.55	...	300 29 11.90	+ 4.14	+ 5.80	-1 34.46	
12	σ^2 Coronæ Borealis	W	...	16 11	...	57.10	51.20	26.650	355 9 30.05	+ 2.87	- 0.14	- 4.70	+34 6 20.78
		E	...	...	...	54.85	50.00	26.650	4 47 13.70	+ 1.69	+ 0.14	+ 4.70	
13	ω Herculis	E	...	16 18 5.5	2 58.3	56.65	50.50	...	24 39 31.88	+ 2.98	-31.33	+ 25.66	+14 15 25.16
		W	...	16 23 9.0	2 5.2	57.70	51.15	...	335 19 52.42	+ 3.59	+15.45	- 25.66	
14	ζ Ophiuchi	W	...	16 29 17.5	2 40.1	56.05	50.45	...	310 42 54.82	+ 2.78	+14.11	-1 4.86	-10 22 15.10
		E	...	16 34 12.0	2 14.4	55.15	50.15	...	49 16 13.48	+ 2.37	- 9.94	+1 4.86	
15	ι Ophiuchi	W	...	16 41 9.0	2 50.4	57.45	50.35	...	296 37 40.70	+ 3.12	+12.54	-1 50.98	-24 28 15.90
		E	...	16 46 25.0	2 25.6	54.85	49.85	...	63 21 26.88	+ 2.21	- 9.16	+1 50.97	
16	σ Ophiuchi	E	...	16 53 15.0	2 50.2	56.25	50.35	...	42 58 54.32	+ 2.78	-17.98	+ 52.08	- 4 4 35.32
		W	...	16 58 16.0	2 10.8	59.50	51.50	...	317 0 24.15	+ 4.14	+10.62	- 52.07	
17	A Ophiuchi (<i>mean</i>)	W	...	17 6 46.0	2 46.3	56.15	50.20	...	294 38 32.18	+ 2.66	+11.56	-2 1.22	-26 27 36.04
	August 6, L.	E	...	17 11 24.0	1 51.7	54.60	49.75	...	65 20 32.90	+ 2.05	- 5.21	+2 1.23	
18	α Serpentis	E	...	15 37 51.0	1 42.4	53.00	52.65	...	32 10 35.70	+ 2.61	- 8.29	+ 34.15	+ 6 43 47.46
		W	...	15 42 12.0	2 38.6	52.00	51.80	...	327 48 17.60	+ 2.05	+19.90	- 34.17	
19	δ Scorpii	W	...	15 52 0.0	2 41.0	48.55	50.50	...	298 44 51.08	+ 0.45	+11.60	-1 38.67	-22 20 53.96
		E	...	15 56 43.0	2 2.0	49.95	51.50	...	61 14 12.82	+ 1.24	- 6.66	+1 38.70	
20	δ Ophiuchi	E	...	16 6 31.0	2 49.3	51.65	52.40	...	42 21 0.65	+ 2.18	-18.02	+ 49.60	- 3 26 43.04
		W	...	16 11 39.5	2 19.2	51.50	51.70	...	317 38 10.18	+ 1.87	+12.18	- 49.62	

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>	<i>s</i>		<i>in</i>	<i>4. 6. 8.</i>	<i>1.</i>	<i>2.</i>	<i>3.</i>	<i>4.</i>			
14 11 15	74.2	76.9	29.806	Instrument in meridian, observation at IX with movable thread.					1	359 59 18.76	
14 11 44	74.0			Instrument in meridian, observation at I with movable thread.					2	38.66	
14 11 51	74.5			Instrument in meridian, observation at VIII with movable thread.					3	37.57	
14 12 05	74.8	74.9	29.806						4	39.00	
14 12 45	74.8								5	38.26	
14 13 05	76.1								6	38.73	-15.12
14 13 18	76.3								7	38.57	
14 13 24	76.1	74.2	29.821						8	38.72	
14 13 47	76.0								9	37.49	-10.44
14 14 01	76.0								10	37.88	+ 2.28
14 14 06	76.1								11	37.20	- 0.80
14 14 14	76.0								12	37.66	
14 14 21	76.0	76.7	29.850						13	37.50	-10.89
14 14 32	76.1								14	38.81	
14 14 44	76.3								15	38.14	- 3.28
14 14 56	76.5								16	39.02	
14 15 10	76.4	76.3	29.850						17	38.08	
14 15 41	76.2	80.5	29.795						18	34.78	
14 15 55	76.6								19	35.28	
14 16 10	77.6								20	34.51	

Note
14 E. Seeing bad.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ω Herculis	W E	3.5 ...	16 18 9.0 16 23 34.0	2 51.2 2 33.8	48.65 50.45	50.50 51.95	..... .....	335 19 42.05 24 39 20.92	+ 0.53 + 1.68	+28.88 -23.31	- 25.04 + 25.04	+14 15 27.90
2	ζ Ophiuchi	E W	... ...	16 29 3.0 16 34 26.0	2 51.0 2 32.0	51.60 50.75	52.00 51.15	..... .....	49 16 16.85 310 42 51.78	+ 1.91 + 1.32	-16.10 +12.72	+1 3.30 -1 3.33	-10 22 14.88
3	ϵ Scorpii	W E	... ...	16 41 1.0 16 46 58.0	2 57.9 2 59.1	49.00 49.90	50.65 51.45	..... .....	286 59 53.35 72 59 15.10	+ 0.71 + 1.29	+11.62 -11.78	-2 56.44 +2 56.54	-34 7 9.10
4	α Herculis (<i>brighter</i>)	W E	... ...	17 7 42.0 17 12 39.0	2 35.7 2 21.3	52.65 51.80	52.05 52.20	..... .....	335 34 30.75 24 24 30.52	+ 2.22 + 2.08	+24.09 -19.84	- 24.87 + 24.87	+14 30 14.14
5	b Ophiuchi	E W	... ...	17 17 50.0 17 22 56.0	2 42.6 2 23.4	53.20 53.70	52.95 52.60	..... .....	62 58 21.78 297 0 47.08	+ 2.80 + 2.77	-11.49 + 8.94	+1 46.94 -1 46.90	-24 5 7.21
6	ν^1 Draconis	W E	... ...	17 27 43.0 17 32 45.0	2 35.4 2 26.6	52.05 50.70	51.90 51.85	..... .....	16 19 42.02 343 39 25.98	+ 2.07 + 1.70	-20.76 +18.48	+ 16.05 - 16.05	+55 15 21.50
7	π Herculis	E W	... ...	17 47 ..... .....	..... .....	51.90 52.40	51.90 51.75	26.164 26.164	350 28 29.35 9 28 45.62	+ 2.68 + 2.75	+ 0.38 - 0.38	- 0.18 + 0.18	+48 25 33.83
8	γ^0 Ophiuchi (<i>mean</i>)	W E	... ...	17 58 31.0 18 3 4.0	2 7.0 2 26.0	48.90 48.80	50.40 50.70	..... .....	323 36 21.68 36 22 54.55	+ 0.45 + 0.61	+11.52 -15.23	- 40.41 + 40.41	+ 2 31 33.31
9	β^6 Draconis	E W	... ...	18 10 43.0 18 15 53.0	2 39.5 2 30.5	50.80 51.95	51.00 51.05	..... .....	334 32 51.25 25 26 15.82	+ 1.25 + 1.53	+10.87 - 9.67	- 26.11 + 26.11	+64 22 15.12
10	ϵ Serpentis	W E	... ...	18 21 58.0 18 26 54.0	2 45.2 2 10.8	49.60 48.50	50.45 50.50	..... .....	319 2 13.28 40 56 51.32	+ 0.79 + 0.43	+17.65 -11.07	- 47.60 + 47.60	- 2 2 35.22
11	ϵ^1 Lyrae (<i>s. star</i>)	E W	... ...	18 41 ..... .....	..... .....	50.25 51.50	50.90 50.90	26.517 26.517	359 19 10.18 0 37 39.45	+ 1.82 + 2.17	+ 0.28 - 0.28	- 0.63 + 0.63	+39 34 32.02
12	θ Serpentis	W E	... ...	18 48 49.0 18 53 56.0	2 39.8 2 27.2	48.20 48.05	50.15 50.20	..... .....	325 9 37.35 34 49 30.12	+ 0.24 + 0.22	+18.92 -16.05	- 38.19 + 38.19	+ 4 4 59.78
13	ϵ Lyrae	E W	... ...	19 4 ..... .....	..... .....	49.15 51.70	50.65 51.10	26.140 26.140	2 56 35.25 357 0 45.58	+ 1.39 + 2.25	+ 0.24 - 0.24	+ 2.85 - 2.85	+35 57 19.36
14	ω Aquilæ	W E	... ...	19 10 37.0 19 15 42.5	2 43.7 2 21.8	49.20 48.05	50.35 50.65	..... .....	332 30 1.18 27 29 2.18	+ 0.62 + 0.41	+24.14 -18.12	- 28.60 + 28.60	+11 25 39.00
15	ϵ Aquilæ	E W	... ...	19 23 8.0 19 27 56.0	2 32.8 2 15.2	50.15 52.30	50.65 51.75	..... .....	41 53 20.18 318 5 51.70	+ 0.95 + 2.08	-14.81 +11.60	+ 49.28 - 49.27	- 2 59 2.88
16	ι^0 Vulpeculæ	W E	... ...	19 37 1.5 19 42 17.0	2 44.1 2 31.4	49.25 47.85	50.30 50.05	..... .....	346 36 37.45 13 22 25.80	+ 0.50 + 0.02	+44.54 -37.93	- 13.09 + 13.09	+25 32 51.07
17	ϕ Aquilæ	E W	... ...	19 49 5.5 19 53 59.0	2 38.1 2 15.4	50.45 52.70	51.15 51.85	..... .....	27 44 17.75 332 14 55.58	+ 1.21 + 2.16	-22.35 +16.39	+ 28.94 - 28.95	+11 10 26.68
18	August 11, L. η Draconis	W E	... ...	16 20 23.0 16 25 17.0	2 19.0 2 35.0	49.00 53.75	49.05 51.65	..... .....	22 48 20.30 337 10 46.32	+ 0.05 + 2.56	-10.01 +12.45	+ 23.07 - 23.08	+61 44 14.44
19	α^2 Herculis	E W	... ...	16 33 51.0 16 37 40.5	2 18.8 1 30.7	54.75 54.30	51.80 51.45	..... .....	349 47 11.68 10 11 38.55	+ 2.91 + 2.63	+30.21 -12.91	- 9.89 + 9.89	+49 7 18.48
20	k Herculis	W E	... ...	16 43 2.5 16 48 10.0	2 39.1 2 28.4	52.55 53.50	50.95 51.65	..... .....	328 29 32.32 31 29 33.85	+ 1.95 + 2.54	+20.39 -17.74	- 33.68 + 33.69	+ 7 25 1.18

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
6 16 21	77.0	...	...	7, 11, 13. Instrument in meridian, observation at I with movable thread.	1	359 59 35.38	-13.64
16 32	76.6	78.3	29.731		2	34.22	
16 44	75.9	...	...		3	35.20	
17 11	74.8	...	...		4	34.91	
17 21	75.1	...	...		5	35.96	
17 30	75.6	77.2	29.751		6	34.74	-23.15
17 45	74.5	...	...		7	33.86	-22.73
18 1	74.4	...	...		8	30.79	
18 14	74.1	...	...		9	35.52	23.32
18 25	74.1	76.1	29.751		10	36.20	-15.65
18 52	73.8	...	...		11	34.89	-21.98
19 14	73.2	75.2	29.743*	Notes.	12	35.49	
19 26	73.1	...	...	4 W. Bad seeing.	13	34.92	
19 40	72.6	...	...	7 W. Very faint.	14	35.20	
19 52	72.5	74.8	29.732	Clouds.	15	35.86	-18.00
11 16 23	77.9	...	...	Barometer reading changed from 29.943 to 29.743.	16	35.19	-19.89
16 36	77.3	...	...		17	35.36	
16 46	76.7	...	...		18	35.83	
					19	36.54	-21.97
					20	36.66	-13.26

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	d Herculis	E		16 58		55.30	51.95	25.795	5 11 20.82	+ 3.85	+ 0.22	+ 5.02	+33 42 44.53
		W				56.50	52.05	25.795	354 46 26.35	+ 4.14	- 0.22	- 5.02	
2	u Herculis	W		17 14		54.80	51.50	27.072	354 15 25.52	+ 2.04	- 0.22	- 5.51	+33 12 32.50
		E				53.70	51.45	27.072	5 40 43.10	+ 1.71	+ 0.22	+ 5.51	
3	d Ophiuchi	E		17 19 7.0	2 9.1	55.05	51.70		68 39 20.40	+ 2.94	- 6.50	+ 19.99	-29 46 44.44
		W		17 23 30.0	2 13.9	57.00	52.00		291 19 43.50	+ 3.59	+ 7.09	- 2 20.04	
4	δ Draconis	W		17 28 6.0	2 18.1	55.45	51.55		16 18 56.75	+ 2.93	- 16.41	+ 16.14	+55 14 40.53
		E		17 32 49.0	2 24.9	52.85	50.40		343 40 8.38	+ 1.77	+ 18.07	- 16.15	
5	87 Herculis	E		17 42 5.0	2 52.6	54.15	50.85		13 15 50.60	+ 2.32	- 49.65	+ 13.01	+25 39 36.70
		W		17 47 31.5	2 33.9	57.55	52.55		346 43 25.52	+ 3.08	+ 39.47	- 13.01	
6	70 Ophiuchi (mean)	E		17 58 2.5	2 36.0	53.40	50.45		36 22 55.20	+ 1.87	- 17.39	+ 40.66	+ 2 31 33.86
		W		18 3 0.0	2 21.5	57.05	52.30		323 36 16.75	+ 3.94	+ 14.31	- 40.67	
7	30 Draconis	W		18 10 48.5	2 34.3	56.30	51.95		25 26 15.92	+ 3.31	- 10.17	+ 26.27	+64 22 15.67
		E		18 16 17.0	2 54.2	53.30	50.90		334 32 48.95	+ 2.07	+ 12.96	- 26.27	
8	c Serpentis	E		18 22 8.0	2 35.7	54.35	50.85		40 56 53.80	+ 2.31	- 15.68	+ 47.90	- 2 2 34.78
		W		18 27 9.0	2 25.3	58.20	52.45		319 2 15.15	+ 4.14	+ 13.66	- 47.90	
9	ε ¹ Lyrae (mean)	W		18 41		56.65	51.80	27.034	37 20.22	+ 2.66	- 0.28	+ 0.63	+39 34 33.03
		E				53.00	50.25	27.034	359 18 50.30	+ 0.94	+ 0.28	- 0.63	
10	θ Serpentis	E	4	18 49 7.0	2 22.3	54.85	50.70		34 49 26.52	+ 2.38	- 15.00	+ 38.42	+ 4 5 0.42
		W		18 54 6.0	2 36.7	58.55	52.55		325 9 35.42	+ 4.24	+ 18.19	- 38.42	
11	γ Lyrae	W		19 4		57.70	52.40	26.574	357 0 30.92	+ 3.17	- 0.24	- 2.86	+35 57 20.82
		E				53.55	50.40	26.574	2 56 18.85	+ 1.12	+ 0.24	+ 2.86	
12	ω Aquilæ	E		19 10 49.5	2 31.7	55.00	50.80		27 29 2.78	+ 2.45	- 20.73	+ 28.77	+11 25 39.78
		W		19 15 41.0	2 19.8	58.45	52.30		332 30 6.15	+ 4.12	+ 17.61	- 28.78	
13	e Aquilæ	W		19 23 10.0	2 31.3	56.25	51.65		318 5 49.60	+ 3.24	+ 14.52	- 49.62	- 2 59 2.98
		E		19 28 18.0	2 36.7	53.55	50.40		41 53 21.45	+ 1.91	- 15.58	+ 49.65	
14	10 Vulpeculæ	E		19 37 2.0	2 44.1	55.00	50.95		13 22 29.68	+ 2.50	- 44.56	+ 13.19	+25 32 52.10
		W		19 42 16.5	2 30.4	59.00	52.90		346 36 42.58	+ 4.48	+ 37.43	- 13.19	
15	φ Aquilæ	W		19 48 54.0	2 50.1	57.60	52.00		332 14 48.70	+ 3.69	+ 25.87	- 29.16	+11 10 28.22
		E		19 54 2.5	2 18.4	53.40	50.30		27 44 12.58	+ 1.75	- 17.13	+ 29.17	
16	20 Vulpeculæ	E		20 5 20.0	2 41.8	54.70	50.60		12 43 31.50	+ 2.30	- 45.25	+ 12.54	+26 11 51.82
		W		20 10 28.5	2 26.7	59.90	53.10		347 15 41.50	+ 4.86	+ 37.20	- 12.54	
17	π Capricorni	W		20 19 9.0	2 43.5	56.45	51.50		302 34 14.72	+ 3.23	+ 12.76	- 1 26.64	-18 31 16.78
		E		20 24 36.5	2 44.0	51.45	49.55		57 24 56.60	+ 0.94	- 12.84	+ 1 26.65	
18	ζ Delphini	E		20 28 11.5	2 40.5	52.70	49.90		24 33 57.28	+ 1.48	- 25.47	+ 25.39	+14 20 55.16
		W		20 33 13.0	2 21.0	58.60	52.50		335 25 16.80	+ 4.21	+ 19.66	- 25.40	
19	August 12, L. δ Ophiuchi	W		16 6 40.5	2 40.3	51.95	51.65		317 38 8.68	+ 1.70	+ 16.15	- 50.63	- 3 26 42.62
		E		16 11 45.5	2 24.7	50.60	50.45		42 20 56.68	+ 0.69	- 13.16	+ 50.65	
20	γ Draconis	E		16 20 2.0	2 40.1	50.75	50.50		337 10 46.80	+ 0.74	+ 13.28	- 23.40	+61 44 14.93
		W		16 25 17.0	2 34.9	52.50	51.60		22 48 20.88	+ 1.69	- 12.43	+ 23.42	

Time	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904 0.
<i>d h m</i>			<i>in</i>								<i>° ' "</i>	<i>"</i>
11 17 3	76.2		29.960	Instrument in meridian, observation at I with movable thread						1	359 59 36.17	
12 12	76.1			Instrument in meridian, observation at IX with movable thread						2	36.42	-20.76
12 22	75.6									3	35.44	
12 31	75.8									4	35.74	-21.91
12 40	75.5									5	36.12	-20.10
12 48	74.8									6	37.14	
13 14	76.2	75.2	29.970							7	36.52	-11.19
13 25	74.5									8	36.69	-15.91
13 52	74.9									9	36.25	-23.04
19 2	76.8									10	35.88	
19 11	71.1	70.1	29.998							11	37.43	
19 26	71.7									12	36.18	
19 35	71.1									13	37.68	-18.15
19 42	71.2	70.2	29.998							14	36.06	-21.72
20 8	71.4									15	37.74	-20.65
20 11	71.8									16	36.06	-21.48
20 12	72.6	71.6	29.995							17	37.71	
20 15	72.4	71.4	29.995							18	36.98	-20.91
20 23	72.1									19	35.98	
										20	37.49	

Note
Unsteady

No.	Date, observer, and object.	Circ- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	24 Scorpii	W	...	16 33 20.0	2 43.5	50.70	50.50	...	303 32 10.78	+ 0.82	+12.97	-1 23.87	-17 33 17.24
		E	...	16 38 33.0	2 29.5	50.65	50.35	...	56 26 55.15	+ 0.65	-10.85	+1 23.94	
2	k Herculis	E	...	16 43 5.0	2 36.6	52.70	51.80	...	31 29 33.85	+ 1.93	-19.75	+ 34.21	+ 7 25 1.04
		W	...	16 48 4.0	2 22.4	53.55	51.55	...	328 29 34.48	+ 2.02	+16.33	- 34.23	
3	117 G. Scorpii	W	...	16 53 13.0	2 29.8	52.55	50.95	...	289 6 45.00	+ 1.41	+ 8.55	-2 39.61	-32 0 2.31
		E	...	16 58 4.0	2 21.2	51.65	50.90	...	70 52 20.52	+ 1.13	- 7.59	+2 39.63	
4	u Herculis	E	...	17 14 ....	...	54.05	51.70	26.154	5 41 19.10	+ 2.92	+ 0.22	+ 5.60	+33 12 31.73
		W	...	...	...	55.15	51.90	26.154	354 16 0.05	+ 3.35	- 0.22	- 5.60	
5	d Ophiuchi	W	...	17 18 41.0	2 35.2	52.90	51.05	...	291 19 45.30	+ 1.62	+ 9.52	-2 22.15	-29 46 43.71
		E	...	17 23 44.0	2 27.8	51.85	50.55	...	68 39 20.85	+ 1.08	- 8.64	+2 22.14	
6	ε Serpentis	E	2.5	17 29 33.0	2 34.9	53.40	51.20	...	54 13 53.02	+ 1.82	-12.10	+1 17.55	-15 20 7.52
		W	...	17 34 33.0	2 25.1	54.55	51.65	...	305 45 16.20	+ 2.30	+10.62	-1 17.59	
7	87 Herculis	W	...	17 42 16.0	2 41.7	51.75	50.40	...	346 43 24.68	+ 0.98	+43.58	- 13.22	+25 39 36.65
		E	...	17 47 30.5	2 32.8	50.65	50.25	...	13 15 41.48	+ 0.66	-38.92	+ 13.22	
8	τ Ophiuchi (mean)	E	...	17 55 6.0	2 48.0	52.50	50.80	...	47 4 42.95	+ 1.32	-16.18	+1 0.20	- 8 10 35.69
		W	...	18 0 22.0	2 28.0	54.85	51.75	...	312 54 28.48	+ 2.36	+12.56	-1 0.21	
9	μ Sagittarii	W	...	18 5 25.0	2 39.1	53.25	50.90	...	300 0 50.42	+ 1.57	+11.57	-1 36.73	-21 4 52.11
		E	...	18 10 36.0	2 31.9	51.05	50.05	...	59 58 18.00	+ 0.56	-10.55	+1 36.76	
10	446 B. Herculis	E	...	18 15 32.0	2 38.8	52.50	50.75	...	15 40 40.28	+ 1.30	-36.37	+ 15.76	+23 14 30.64
		W	...	18 20 34.5	2 23.7	55.75	52.15	...	344 18 31.70	+ 2.80	+29.78	- 15.76	
11	3 H. Scuti	W	...	18 27 16.0	2 45.7	53.60	51.00	...	312 46 36.88	+ 1.68	+15.71	-1 0.59	- 8 18 25.91
		E	...	18 32 25.0	2 23.3	50.90	49.95	...	47 12 29.90	+ 0.48	-11.75	+1 0.59	
12	ε ² Lyrae (mean)	E	...	18 41 ....	...	52.10	50.35	25.475	359 23 21.05	+ 1.77	+ 0.28	- 0.58	+39 31 5.58
		W	...	...	...	55.05	51.75	25.475	0 34 56.48	+ 3.17	- 0.28	+ 0.58	
13	o Draconis	W	2	18 47 41.0	2 8.8	53.95	51.05	...	20 20 44.50	+ 1.81	-10.34	+ 20.84	+59 16 38.32
		E	...	18 52 18.0	2 28.2	50.30	49.75	...	339 38 20.82	+ 0.22	+13.69	- 20.85	
14	17 Lyrae	E	...	19 4 ....	...	52.40	50.65	26.403	6 32 18.62	+ 1.93	+ 0.21	+ 6.47	+32 21 22.37
		W	...	...	...	56.05	51.90	26.403	353 24 41.45	+ 3.48	- 0.21	- 6.47	
15	159 B. Lyrae	W	...	19 16 ....	...	53.70	51.05	26.637	1 14 26.58	+ 1.00	- 0.28	+ 1.24	+40 11 21.66
		E	...	...	...	50.40	49.50	26.637	358 42 20.52	- 0.61	+ 0.28	- 1.24	
16	6 Vulpeculae	E	...	19 22 4.0	2 41.2	51.55	50.15	...	14 26 41.48	+ 0.76	-40.22	+ 14.49	+24 28 35.04
		W	...	19 27 6.3	2 21.1	55.50	51.75	...	345 32 34.00	+ 2.53	+30.82	- 14.49	
17	14 Cygni	W	...	19 36 ....	...	53.75	51.15	27.764	3 38 24.38	+ 1.06	- 0.31	+ 3.62	+42 36 9.11
		E	...	...	...	50.15	49.50	27.764	356 16 48.20	- 0.64	+ 0.31	- 3.62	
18	August 15, L. α Scorpii	W	...	16 17 56.0	5 37.9	51.05	50.35	...	294 52 20.12	+ 0.71	+47.90	-1 57.09	-26 13 7.42
		E	...	16 23 40.0	0 6.1	52.65	51.00	...	65 6 1.62	+ 1.52	- 0.02	+1 57.07	
19	114 B. Draconis	E	...	16 41 27.0	2 2.9	54.75	52.05	...	341 57 22.02	+ 2.54	+11.28	- 17.82	+56 57 35.09
		W	...	16 46 10.0	2 40.1	53.85	51.50	...	18 1 53.75	+ 2.06	-19.15	+ 17.82	
20	d Herculis	W	...	16 58 ....	...	54.05	51.75	27.493	354 45 21.98	+ 1.48	- 0.22	- 5.01	+33 42 46.58
		E	...	...	...	53.50	51.70	27.493	5 10 12.22	+ 1.36	+ 0.22	+ 5.00	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
12 10 30	71.1	...	...	4, 12, 14. Instrument in meridian, observation at I with movable thread.						1	359 59 34.80	- 4.71
10 46	70.1	...	...	15, 17, 20. Instrument in meridian, observation at IX with movable thread.						2	34 42	-13.31
10 56	70.2	71.6	30.044							3	34 53	-1.48
17 12	69.2	...	...							4	35 06	-20.86
17 22	69.5	...	...							5	34 86	...
17 33	68.9	...	...							6	35 91	...
17 45	68.5	70.7	30.042							7	35 23	-20.41
17 58	68.5	...	...							8	35 74	-12.99
18 8	68.1	...	...							9	35 80	...
18 19	67.9	...	...							10	34 74	-20.84
18 30	67.8	...	...							11	36 45	...
18 39	67.7	69.8	30.046							12	36 76	-23.22
18 51	67.2	...	...							13	35 34	...
19 1	67.2	...	...							14	36 15	-22.55
19 25	67.1	...	...							15	36 72	-23.04
19 35	66.8	69.1	30.043							16	34 68	...
15 16 24	76.5	...	...							17	35 49	-22.77
16 33	...	77.1	29.738							18	35 92	...
16 45	75.6	...	...							19	36 25	...
17 2	73.0	...	...							20	36 04	...

Note.
s. Unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Herculis (<i>brighter</i>)	E W	4	17 7 26.5 17 12 33.0	2 52.0 2 14.5	53.45 51.00	51.00	.....	24 24 38.78 335 34 38.68	+ 1.73 + 1.65	-29.40 +17.98	+ 24.96 - 24.96	+14 30 15.50
2	x Herculis	W E	3	17 24 ..... .....	..... .....	51.25 51.45	50.30 50.75	27.382 27.382	9 23 15.20 350 32 28.92	+ 0.05 + 0.29	- 0.37 + 0.37	+ 9.13 - 9.13	+48 20 48.64
3	ξ Serpentis	W E	3	17 30 10.0 17 34 42.0	1 58.2 2 33.8	52.55 51.35	50.80 50.25	.....	305 45 18.82 54 13 55.95	+ 1.35 + 0.82	+ 7.05 -11.93	-1 16.22 +1 16.22	-15 20 8.18
4	168 H ¹ . Herculis	E W	3	17 49 ..... .....	..... .....	53.00 53.55	51.15 51.40	26.050 26.050	358 53 28.60 1 3 59.50	+ 2.38 + 2.67	+ 0.28 + 0.28	- 1.04 + 1.04	+40 0 33.22
5	τ Ophiuchi (<i>mean</i>)	W E	3	17 55 7.0 18 0 13.0	2 47.2 2 18.8	51.55 51.55	50.45 50.55	.....	312 54 26.58 47 4 39.62	+ 0.88 + 0.95	+16.03 -11.05	- 59.10 + 59.10	- 8 10 35.26
6	μ Sagittarii	E W	3.5	18 6 14.0 18 10 23.0	1 50.4 2 18.6	53.20 54.60	51.35 51.75	.....	59 58 14.25 300 0 50.50	+ 1.73 + 2.32	- 5.57 + 8.78	+1 34.92 -1 34.93	-21 4 52.47
7	446 B. Herculis	W E	3	18 15 40.5 18 20 46.0	2 30.5 2 35.0	52.65 51.70	50.50 50.80	.....	344 18 32.35 15 40 38.20	+ 1.19 + 1.11	+32.67 -34.65	- 15.46 + 15.46	+23 14 32.18
8	3 H. Scuti	E W	2.5	18 27 21.0 18 32 2.5	2 40.9 2 0.6	54.05 54.05	51.45 51.05	.....	47 12 31.50 312 46 41.92	+ 2.01 + 1.82	-14.81 + 8.32	+ 59.57 - 59.61	- 8 18 26.05
9	ϵ^2 Lyrae (<i>mean</i>)	W E	2.5	18 41 ..... .....	..... .....	52.20 50.65	50.30 50.00	27.954 27.954	0 33 19.15 359 21 39.28	+ 0.29 - 0.23	- 0.28 + 0.28	+ 0.58 - 0.58	+39 31 7.36
10	σ Draconis	E W	2.5	18 47 13.0 18 52 17.0	2 37.0 2 27.0	51.90 53.35	50.90 50.95	.....	339 38 18.38 20 20 48.78	+ 1.19 + 1.61	+15.36 -13.47	- 20.49 + 20.49	+59 16 38.34
11	17 Lyrae	W E	3	19 4 ..... .....	..... .....	52.00 50.95	50.60 50.30	26.638 26.638	353 24 36.78 6 32 11.12	+ 0.35 + 0.03	- 0.21 + 0.21	- 6.36 + 6.36	+32 21 23.28
12	6 Vulpeculae	W E	3	19 22 17.5 19 27 12.5	2 28.0 2 27.0	53.00 51.90	50.55 50.45	.....	345 32 33.42 14 26 35.58	+ 1.30 + 0.98	+33.91 -33.45	- 14.25 + 14.25	+24 28 35.37
13	14 Cygni	E W	3	19 36 ..... .....	..... .....	52.30 54.00	50.50 51.30	25.021 25.021	356 18 37.30 3 40 14.82	+ 1.83 + 2.63	+ 0.31 + 0.31	- 3.56 + 3.56	+42 36 9.27
14	η Sagittarii	W E	3	19 50 9.0 19 55 5.0	2 24.7 2 31.3	52.00 51.50	50.50 50.30	.....	305 20 57.35 54 38 14.42	+ 1.05 + 0.78	+10.48 -11.46	-1 17.82 +1 17.84	-15 44 28.40
15	66 Aquilae	E W	3	20 5 43.0 20 10 59.0	2 36.6 2 39.4	53.30 54.35	50.85 51.35	.....	40 11 50.60 319 47 16.85	+ 1.60 + 2.08	-16.11 +16.70	+ 46.76 - 46.77	- 1 17 30.14
16	296 G. Sagittarii	W E	4	20 17 4.0 20 21 50.0	2 33.7 2 12.3	52.75 50.90	50.55 49.85	.....	292 8 11.00 67 50 55.12	+ 1.33 + 0.45	+ 9.47 - 7.01	-2 15.12 +2 15.12	-28 58 11.64
17	13 G. Microscopii	E W	3	20 32 3.0 20 36 34.0	2 19.2 2 11.8	53.45 54.35	51.15 51.20	.....	72 38 1.68 287 21 5.92	+ 1.80 + 1.99	- 7.16 + 6.42	+2 55.12 -2 55.16	-33 45 59.28
18	α Scorpii August 16, L.	W E	3.5	16 21 6.0 16 25 49.0	2 28.0 2 15.0	49.40 48.55	49.55 49.50	.....	294 53 0.38 65 6 9.95	+ 0.31 + 0.02	+ 9.10 - 7.65	-1 57.67 +1 57.71	-26 13 7.05
19	24 Scorpii	E W	4	16 33 4.0 16 38 5.0	2 59.8 2 1.2	51.60 53.25	50.95 51.00	.....	56 27 1.18 303 32 14.88	+ 1.56 + 2.06	-15.69 + 7.13	+1 22.65 -1 22.67	-17 33 17.29
20	20 Ophiuchi	W E	3.5	16 41 54.0 16 46 50.0	2 40.0 2 16.0	51.55 49.95	50.55 49.60	.....	310 28 28.60 49 30 39.00	+ 1.32 + 0.45	+14.03 -10.14	-1 4.30 +1 4.31	-10 36 40.12

Time	Ther. 1904.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>' "</i>	<i>"</i>
15 12 19	72.1	.....	.....	Instrument in meridian, observation at IX with movable thread.	1	169 59 34.71	.....
17 28	72.5	.....	.....	Instrument in meridian, observation at I with movable thread.	2	15.22	-23.80
18 11	72.8	.....	.....		3	30.02	.....
19 46	72.5	74.2	29.719		4	35.18	-21.11
20 08	72.7	.....	.....		5	36.60	-13.12
21 9	72.5	.....	.....		6	36.00	.....
22 19	72.6	.....	.....		7	35.44	-21.28
23 19	70.6	.....	.....		8	35.16	.....
24 31	70.7	.....	.....		9	35.60	-25.83
25 1	70.5	72.7	29.711		10	35.92	.....
26 25	70.1	.....	.....		11	36.75	-25.15
27 47	69.9	72.1	29.718		12	35.87	.....
28 9	69.4	.....	.....	Notes.	13	34.86	-21.51
29 21	69.5	.....	.....	1. Preceding star observed.	14	36.12	-17.63
30 15	69.2	71.1	29.741	1 E. Level correction assumed.	15	35.86	-20.11
31 24	71.5	76.1	29.726	20. Clouds.	16	35.18	-17.16
32 46	71.1	.....	.....		17	35.10	-17.43
33 45	72.8	.....	.....		18	36.12	.....
					19	35.66	-4.87
					20	36.64	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	August 17, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Scorpii	E W	3 4	16 21 6.0 16 25 42.0	2 28.1 2 7.9	53.25 54.55	51.45 52.00	..... .....	65 6 9.92 294 52 59.10	+ 3.66 + 4.32	- 9.20 + 6.86	+1 56.47 -1 56.51	-26 13 6.68
2	α_2 Herculis	W E	2.5 ...	16 33 16.5 16 37 51.5	2 53.7 1 41.3	52.65 49.70	51.15 50.50	..... .....	10 12 11.42 349 47 24.60	+ 3.49 + 2.38	-47.28 +16.09	+ 9.80 - 9.80	+49 7 18.94
3	α_2 Ophiuchi	E W	3 ...	16 42 1.0 16 47 3.0	2 33.0 2 29.0	51.10 53.10	51.00 51.40	..... .....	49 30 39.90 310 28 27.28	+ 2.94 + 3.62	-12.83 +12.17	+1 3.71 -1 3.74	-10 36 40.34
4	ϵ Herculis	W E	4 ...	16 57 ..... .....	..... .....	52.75 49.10	51.20 50.20	26.903 26.903	352 7 25.78 7 48 56.98	+ 2.77 + 1.32	- 0.20 + 0.20	- 7.52 + 7.52	+31 4 24.26
5	α Herculis (<i>brighter</i>)	E W	2.5 ...	17 7 31.5 17 12 32.3	2 47.1 2 13.7	50.60 53.15	50.80 51.30	..... .....	24 24 38.35 335 34 38.72	+ 2.71 + 3.60	-27.75 +17.77	+ 24.79 - 24.80	+14 30 15.46
6	α Herculis	E W	3 ...	17 24 ..... .....	..... .....	48.60 51.25	49.50 50.50	26.057 26.057	350 33 22.48 9 24 7.32	+ 2.19 + 3.39	+ 0.24 - 0.24	- 9.07 + 9.07	+48 20 48.71
7	α Serpentis	W E	2.5 ...	17 33 40.0 17 38 24.0	2 24.1 2 19.9	50.20 48.35	50.00 49.60	..... .....	308 16 0.88 51 43 10.48	+ 2.29 + 1.58	+10.94 -10.31	-1 9.17 +1 9.22	-12 49 16.16
8	α_{168} H ¹ . Herculis	W E	3 ...	17 49 ..... .....	..... .....	51.30 48.15	50.35 49.15	27.224 27.224	1 3 15.82 358 52 44.58	+ 1.97 + 0.56	- 0.28 + 0.28	+ 1.04 - 1.04	+40 0 33.94
9	γ Sagittarii	E W	4 ...	17 57 24.0 18 2 10.0	2 17.9 2 28.1	49.70 52.55	49.90 50.90	..... .....	69 17 58.90 290 41 6.95	+ 2.11 + 3.28	- 7.44 + 8.58	+2 23.80 -2 23.83	-30 25 24.34
10	α B. Lyrae	W E	4 3	18 13 ..... .....	..... .....	50.50 47.45	50.25 49.25	27.289 27.289	3 10 35.92 356 45 18.75	+ 1.68 + 0.46	- 0.30 + 0.30	+ 3.08 - 3.08	+42 7 58.84
11	λ Sagittarii	E W	3.5 ...	18 19 27.0 18 24 22.0	2 39.2 2 15.8	49.00 52.80	49.55 50.90	..... .....	64 21 28.62 295 37 42.52	+ 1.74 + 3.37	-10.77 + 7.83	+1 53.69 -1 53.73	-25 28 19.78
12	α_{29} H ¹ . Sagittarii	W E	3.5 ...	18 30 39.0 18 35 33.0	2 34.3 2 19.7	50.25 47.70	49.85 48.95	..... .....	299 58 1.22 60 1 8.98	+ 2.23 + 1.10	+10.88 - 8.91	-1 34.81 +1 34.83	-21 7 41.38
13	α_{30} Sagittarii	E W	4 ...	18 42 42.0 18 47 45.0	2 25.6 2 37.4	49.10 53.05	49.60 51.35	..... .....	61 9 29.22 298 49 36.70	+ 1.78 + 3.65	- 9.50 +11.10	+1 39.34 -1 39.36	-22 16 7.52
14	ζ Sagittarii	W E	4 4.5	18 54 12.0 18 59 18.0	2 21.9 2 44.1	51.70 48.45	50.60 49.60	..... .....	291 5 39.50 68 53 34.55	+ 2.95 + 1.63	+ 7.93 -10.60	-2 21.18 +2 21.16	-30 0 51.91
15	α_{21} Aquilae	E W	3 ...	19 6 40.0 19 11 16.0	2 15.4 2 20.6	50.05 54.20	49.65 51.75	..... .....	36 46 16.35 323 12 52.22	+ 1.98 + 4.09	-12.98 +14.00	+ 41.00 - 40.99	+ 2 8 8.34
16	δ Aquilae	W E	2.5 ...	19 17 19.0 19 22 5.5	3 7.7 1 38.8	52.55 48.75	50.95 49.50	..... .....	332 48 54.50 27 9 52.52	+ 3.29 + 1.68	+32.04 - 8.88	- 28.16 + 28.16	+11 44 40.96
17	μ Aquilae	E W	2.5 ...	19 27 6.5 19 31 40.3	2 20.7 2 13.1	49.85 54.45	49.65 51.70	..... .....	31 43 43.92 328 15 27.08	+ 2.02 + 4.17	-15.85 +14.18	+ 33.94 - 33.95	+ 7 10 50.58
18	α_{15} Cygni	W E	...	19 41 ..... .....	..... .....	52.60 48.00	50.80 48.90	26.792 26.792	358 10 45.12 1 45 50.50	+ 2.49 + 0.45	- 0.25 + 0.25	- 1.72 + 1.72	+37 7 43.22
19	γ Sagittarii	E W	3 3.5	19 50 6.0 19 55 3.0	2 27.8 2 29.2	48.55 52.80	49.65 50.85	..... .....	54 38 14.05 305 20 54.90	+ 1.60 + 3.30	-10.94 +11.15	+1 17.30 -1 17.32	-15 44 28.13
20	ρ Capricorni	W E	3.5 ...	20 21 1.0 20 25 51.0	2 25.7 2 24.3	48.10 45.80	49.30 48.10	..... .....	302 58 0.00 57 1 14.15	+ 1.41 + 0.20	+10.20 -10.01	-1 24.55 +1 24.57	-18 7 34.06

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.								No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>										<i>° ' "</i>	<i>"</i>
17 16 24	80.0	81.7	29.806	4, 8, 10, 18. Instrument in meridian, observation at IX with movable thread.								1	359 59 37.31	.....
16 36	79.3	.....	.....	6. Instrument in meridian, observation at II with movable thread.								2	35 35	-22.55
16 45	78.9	.....	.....									3	36 52	.....
17 0	78.3	80.3	29.806									4	36.86	.....
17 11	77.6	.....	.....									5	36.70	.....
17 28	77.6	.....	.....									6	36.57	-24.14
17 36	77.0	.....	.....									7	37.96	-10.53
17 53	76.4	78.3	29.822									8	38.00	-23.69
18 0	76.4	.....	.....									9	36.18	.....
18 22	75.7	.....	.....									10	37.60	-24.36
18 34	75.4	.....	.....									11	36.64	.....
18 46	75.1	77.7	29.823									12	37.76	-11.92
18 57	75.1	.....	.....									13	36.46	-12.42
19 10	75.5	.....	.....									14	37.97	.....
19 20	75.4	.....	.....	Note. 12, 13. Very faint.								15	37.84	-19.09
19 30	75.0	.....	.....									16	37.68	.....
19 53	74.4	.....	.....									17	37.76	.....
20 2	.....	76.4	29.816									18	38.18	23.75
20 24	74.2	.....	.....									19	37.02	-17.68
												20	37.98	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Delphini	E	4	20 30 55.0	2 11.2	47.10	48.50	.....	24 38 43.08	+ 0.69	-16.97	+ 25.25	+14 16 1.84
	August 23, L.	W	3.5	20 35 39.0	2 32.8	52.35	50.85	.....	335 20 21.10	+ 3.15	+23.02	- 25.26	
2	ϵ Scorpii	E	4	16 43 48.0	0 12.4	49.05	50.55	.....	72 59 0.55	+ 1.47	- 0.06	+2 59.52	-34 7 7.60
		W	...	16 49 18.0	5 17.6	49.55	50.95	.....	286 59 33.50	+1.83	+37.05	-2 59.81	
3	δ Herculis	W	3.5	16 58 11.0	2 47.6	47.60	49.95	.....	333 56 57.40	+ 0.81	+26.47	- 27.23	+12 52 36.34
		E	...	17 3 19.0	2 20.4	47.95	50.65	.....	26 2 8.60	+ 1.20	-18.57	+ 27.25	
4	θ Herculis	E	3.5	17 14 ....	.....	49.65	51.10	25.684	1 30 23.38	+ 2.58	+ 0.25	+ 1.49	+37 23 53.00
		W	...	.....	.....	51.05	51.40	25.684	358 27 38.42	+ 3.30	- 0.25	- 1.49	
5	ζ Ophiuchi	W	3.5	17 23 9.0	2 28.2	49.50	50.55	.....	297 12 46.15	+ 1.56	+ 9.58	-1 48.10	-23 53 11.68
		E	...	17 28 10.0	2 32.8	47.50	50.70	.....	62 46 27.18	+ 1.13	-10.19	+1 48.15	
6	θ Serpentis	E	3	17 33 11.0	2 53.7	49.75	50.80	.....	51 43 12.55	+ 1.78	-15.90	+1 10.74	-12 49 15.77
		W	...	17 38 27.0	2 22.3	51.00	51.40	.....	308 16 1.62	+ 2.42	+10.67	-1 10.80	
7	η G. Sagittarii	W	3	17 47 24.0	2 56.0	49.60	50.35	.....	302 18 35.40	+ 1.48	+14.72	-1 28.25	-18 46 57.04
		E	...	17 52 34.0	2 14.0	46.95	50.00	.....	57 40 30.78	+ 0.64	- 8.53	+1 28.26	
8	γ Sagittarii	W	4	17 57 11.0	2 31.5	50.85	51.10	.....	290 41 12.85	+ 2.20	+ 8.98	-2 27.04	-30 25 23.82
		E	...	18 2 2.0	2 19.5	47.00	50.00	.....	69 17 58.15	+ 0.74	- 7.61	+2 27.06	
9	λ Sagittarii	W	3.5	18 19 31.0	2 35.8	51.05	50.90	.....	295 37 43.62	+ 2.18	+10.31	-1 56.18	-25 28 20.32
		E	...	18 24 22.0	2 15.2	47.50	49.65	.....	64 21 25.20	+ 0.66	- 7.77	+1 56.20	
10	η H ¹ Sagittarii	E	3	18 30 43.0	2 31.0	48.80	50.10	.....	60 1 8.25	+ 1.19	-10.42	+1 36.84	-21 7 41.92
		W	...	18 35 37.0	2 23.0	51.90	51.60	.....	299 58 3.05	+ 2.77	+ 9.34	-1 36.85	
11	ζ Sagittarii	W	3	18 42 36.0	2 32.3	50.10	50.85	.....	298 49 40.92	+ 1.92	+10.39	-1 41.44	-22 16 7.98
		E	...	18 47 37.0	2 28.7	46.50	49.70	.....	61 9 29.48	+ 0.44	- 9.91	+1 41.45	
12	ζ Sagittarii	E	3.5	18 53 2.0	3 32.5	48.75	50.20	.....	68 53 39.42	+ 1.26	-17.78	+2 24.19	-30 0 52.52
		W	4	18 58 57.0	2 22.5	51.05	51.15	.....	291 5 42.22	+ 2.30	+ 8.00	-2 24.18	
13	α Aquilæ	W	2.5	19 6 17.0	2 39.0	49.80	50.60	.....	323 12 53.78	+ 1.67	+17.90	- 41.89	+ 2 8 9.56
		E	...	19 11 19.0	2 23.0	48.00	50.00	.....	36 46 17.70	+ 0.89	-14.48	+ 41.94	
14	δ Aquilæ	E	2.5	19 17 53.5	2 33.9	48.40	49.90	.....	27 10 3.85	+ 1.04	-21.54	+ 28.91	+11 44 41.66
		W	...	19 22 46.5	2 19.1	51.35	51.25	.....	332 49 10.82	+ 2.40	+17.60	- 28.96	
15	μ Aquilæ	W	2.5	19 27 10.0	2 17.8	49.80	50.55	.....	328 15 30.42	+ 1.69	+15.20	- 34.90	+ 7 10 50.50
		E	...	19 31 51.0	2 23.2	49.20	50.55	.....	31 43 45.08	+ 1.55	-16.41	+ 34.91	
16	ν Cygni	E	2.5	19 41 ....	.....	49.75	50.55	25.785	1 46 27.30	+ 2.35	+ 0.25	+ 1.77	+37 7 44.94
		W	...	.....	.....	52.50	51.90	25.785	358 11 26.08	+ 3.76	- 0.25	- 1.77	
17	δ Sagittarii	E	3	19 54 3.0	2 37.1	49.10	50.75	.....	52 47 44.38	+ 1.62	-12.76	+1 14.23	-13 53 52.84
		W	...	19 59 6.0	2 25.9	52.90	51.80	.....	307 11 28.22	+ 3.09	+11.00	-1 14.23	
18	α Vulpeculæ	W	...	20 5 33.5	2 29.6	50.85	51.15	.....	347 15 48.48	+ 2.27	+38.68	- 12.75	+26 11 54.75
		E	...	20 10 27.5	2 24.4	48.45	49.75	.....	12 43 23.25	+ 0.94	-36.04	+ 12.75	
19	α G. Sagittarii	E	2.5	20 17 1.0	2 37.5	49.75	50.40	.....	67 50 56.65	+ 1.56	- 9.94	+2 17.76	-28 58 11.82
		W	...	20 22 0.0	2 21.5	54.30	52.45	.....	292 8 14.62	+ 3.79	+ 8.02	-2 17.75	
20	ζ Delphini	W	2.5	20 28 13.5	2 39.8	52.25	51.40	.....	335 25 17.25	+ 2.70	+25.25	- 25.80	+14 20 57.25
		E	...	20 33 10.5	2 17.2	48.55	49.60	.....	24 33 50.50	+ 0.92	-18.61	+ 25.81	

Time	Ther. 1902	Att. ther	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>in</i>				
17 25 14	71.9	76.4	29.825	4 16. Instrument in meridian, observation at I with movable thread.	1	359 59 37.03	.....
23 16 52	72.3	74.9	29.826		2	37.02	.....
17 1	71.7	.....	.....		3	37.96	-16.49
17 26	70.8	.....	.....		4	37.49	-22.87
17 16	70.0	.....	.....		5	37.73	- 6.29
17 45	69.6	.....	.....		6	36.54	-10.03
18 2	69.5	74.9	29.826		7	37.25	- 9.66
18 24	69.1	.....	.....		8	37.60	.....
18 11	69.1	.....	.....		9	37.11	.....
18 45	68.9	.....	.....		10	37.08	-11.82
18 56	68.8	74.1	29.825		11	36.62	-12.30
19 9	68.8	.....	.....		12	37.73	.....
19 21	68.7	.....	.....		13	38.76	-10.59
19 15	68.4	67.7	29.825		14	37.06	.....
19 57	68.6	.....	.....		15	38.77	.....
20 7	68.6	67.7	29.825	Note. 17 W. One microscope reading increased 20".	16	37.52	-25.14
20 25	68.5	.....	.....		17	37.78	-18.26
20 11	68.5	.....	.....		18	38.79	-24.04
					19	37.36	-16.68
					20	39.01	-22.95

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	3 Aquarii	E	3.5	20 40 8.0	2 36.4	49.50	50.20	.....	44 16 37.25	+ 1.38	-14.80	+ 55.03	- 5 22 24.44
		W	3	20 45 4.0	2 19.6	54.65	52.50	.....	315 42 35.70	+ 3.81	+11.79	- 55.04	
2	7 Capricorni	W	3.5	20 56 27.0	2 33.8	51.45	51.15	.....	300 51 57.45	+ 2.42	+10.97	-1 34.16	-20 13 44.22
	August 24, L.	E	...	21 1 15.0	2 14.2	48.00	49.20	.....	59 7 12.50	+ 0.54	- 8.35	+1 34.15	
3	5 Herculis	E	4	16 38 .....	.....	49.55	51.60	26.900	7 6 24.28	+ 2.79	+ 0.13	+ 6.92	+31 46 55.62
		W	...	.....	.....	49.30	50.60	26.900	352 49 56.40	+ 2.28	- 0.13	- 6.92	
4	1 Ophiuchi	W	3	16 47 1.5	2 29.5	46.60	49.55	.....	331 24 10.75	+ 0.52	+19.49	- 30.11	+10 19 38.94
		E	2.5	16 51 54.0	2 23.0	49.05	51.00	.....	28 35 2.42	+ 1.80	-17.84	+ 30.12	
5	7 Ophiuchi	E	3	17 1 58.0	2 57.9	50.25	51.00	.....	54 30 3.90	+ 2.14	-15.89	+1 17.50	-15 36 14.24
		W	...	17 7 13.5	2 17.6	49.50	50.65	.....	305 29 11.75	+ 1.75	+ 9.50	-1 17.54	
6	5 Herculis	W	3.5	17 14 .....	.....	47.90	50.05	27.347	358 26 33.48	+ 0.44	- 0.16	- 1.47	+37 23 52.90
		E	...	.....	.....	48.55	50.55	.....	1 30 59.28	+ 0.87	+ 0.16	+ 1.47	
7	51 Ophiuchi	E	3	17 23 5.0	2 32.3	50.50	51.50	.....	62 46 26.55	+ 2.39	-10.12	+1 47.36	-23 53 12.00
		W	...	17 27 54.0	2 16.7	49.45	50.60	.....	297 12 46.02	+ 1.69	+ 8.15	-1 47.41	
8	8 Ophiuchi	W	2.5	17 36 15.0	2 32.2	46.90	49.65	.....	325 41 23.50	+ 0.61	+17.39	- 37.87	+ 4 36 41.94
		E	2	17 41 6.5	2 19.3	48.00	50.75	.....	34 17 48.68	+ 1.46	-14.56	+ 37.90	
9	9 G. Sagittarii	E	2.5	17 47 43.0	2 37.1	50.30	51.65	.....	57 40 32.95	+ 2.42	-11.73	+1 27.66	-18 46 57.68
		W	2	17 52 25.0	2 4.9	47.60	49.45	.....	302 18 41.85	+ 0.66	+ 7.41	-1 27.69	
10	72 Ophiuchi	W	3	18 0 5.0	2 46.4	46.30	49.05	.....	330 37 47.55	+ 0.18	+23.63	- 31.29	+ 9 33 18.64
		E	...	18 5 12.5	2 21.1	49.05	51.25	.....	29 21 20.25	+ 1.95	-16.99	+ 31.29	
11	5 B. Lyrae	E	3	18 13 .....	.....	49.75	51.25	25.585	356 46 23.68	+ 2.66	+ 0.19	- 3.13	+42 8 0.52
		W	2.5	.....	.....	48.55	50.35	25.585	3 11 45.82	+ 1.96	- 0.19	+ 3.12	
12	6 Draconis	W	3	18 20 4.0	2 29.8	47.10	49.65	.....	19 49 21.30	+ 0.66	-14.56	+ 20.09	+58 45 7.96
		E	...	18 24 47.5	2 13.7	47.05	50.55	.....	340 9 52.68	+ 1.12	+11.60	- 20.10	
13	84 G. Sagittarii	E	3	18 29 58.0	2 46.5	48.90	50.45	.....	62 28 20.22	+ 1.46	-12.16	+1 46.50	-23 35 1.69
		W	3.5	18 35 5.0	2 20.5	48.30	49.75	.....	297 30 55.80	+ 0.99	+ 8.66	-1 46.53	
14	204 B. Draconis	W	3	18 42 13.0	2 25.0	47.35	49.25	.....	13 57 50.42	+ 0.54	-22.30	+ 13.88	+52 53 22.00
		E	...	18 47 9.0	2 31.0	48.60	50.70	.....	346 1 20.40	+ 1.55	+24.19	- 13.89	
15	1 Aquilae	E	3	18 52 39.0	2 40.6	50.50	51.00	.....	23 58 16.20	+ 2.13	-26.02	+ 24.84	+14 56 37.38
		W	...	18 57 39.0	2 19.4	49.10	49.85	.....	336 1 2.18	+ 1.24	+19.61	- 24.84	
16	19 Lyrae	W	3	19 8 .....	.....	47.60	49.05	27.407	352 10 33.52	- 0.28	- 0.20	- 7.65	+31 7 47.98
		E	...	.....	.....	49.25	51.00	27.407	7 45 14.18	+ 1.13	+ 0.20	+ 7.65	
17	186 G. Sagittarii	E	3	19 18 26.0	2 30.3	49.95	50.70	.....	68 48 25.32	+ 1.85	- 8.91	+2 23.12	-29 55 47.18
		W	3.5	19 23 22.0	2 25.7	50.20	50.50	.....	291 10 46.28	+ 1.82	+ 8.37	-2 23.16	
18	54 Sagittarii	W	3	19 32 37.0	2 40.6	47.40	49.20	.....	304 34 57.72	+ 0.49	+12.74	-1 20.98	-16 30 31.48
		E	...	19 37 38.0	2 20.4	49.05	50.45	.....	55 24 13.88	+ 1.50	- 9.74	+1 21.00	
19	1 Sagittarii	E	3	19 54 7.0	2 42.8	50.80	50.75	.....	66 51 14.00	+ 2.12	-10.80	+2 10.27	-27 58 21.54
		W	...	19 59 9.0	2 19.2	50.25	50.30	.....	293 7 59.38	+ 1.78	+ 7.90	-2 10.28	
20	66 Aquilae	W	3	20 5 48.5	2 32.1	48.40	49.55	.....	319 47 22.95	+ 0.94	+15.20	- 47.34	- 1 17 29.69
		E	...	20 10 38.0	2 17.4	49.50	50.70	.....	40 11 48.12	+ 1.80	-12.41	+ 47.34	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
23 20 43	65.2	...	...	3, II. Instrument in meridian, observation at II with movable thread.	1	359 59 37.56	.....
20 59	65.3	67.4	30.074	6. Instrument in meridian; W. observation at VIII with movable thread; E. observation at VIII with fixed thread.	2	37.76	-19.88
24 16 41	74.8	77.3	29.998		3	36.18	.....
16 51	74.8	...	...	16. Instrument in meridian, observation at IX with movable thread.	4	38.58	-15.13
17 5	73.5	...	...		5	36.56	.....
17 18	73.2	...	...		6	37.82	-22.93
17 26	72.9	74.8	29.998		7	37.32	- 6.27
17 39	74.2	...	...		8	38.56	.....
17 51	71.5	...	...		9	36.76	- 9.63
18 3	71.5	...	...		10	38.28	.....
18 23	70.8	73.3	30.000		11	36.66	-25.46
18 33	70.6	...	...		12	36.40	.....
18 45	70.0	...	...		13	37.47	-11.04
18 56	69.5	...	...		14	37.40	-26.71
19 6	69.3	72.3	30.004		15	37.67	.....
19 21	69.1	...	...		16	38.28	-24.77
19 35	68.5	...	...		17	37.34	-12.64
19 53	68.1	76.9	30.006		18	38.30	.....
20 9	67.8	...	...		19	37.18	.....
					20	38.30	-20.87

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	π Capricorni	E W	3 ...	20 19 15.0 20 24 6.0	2 38.9 2 12.1	51.15 50.50	51.30 50.50	..... .....	57 24 53.72 302 34 21.75	+ 2.47 + 1.89	-12.05 + 8.33	+1 27.50 -1 27.49	-18 31 16.72
2	13 G. Microscopii	W E	3 ...	20 31 50.0 20 36 34.0	2 33.2 2 10.8	49.45 49.30	50.20 50.30	..... .....	287 21 6.25 72 38 2.15	+ 1.51 + 1.56	+ 8.67 - 6.32	-2 57.14 +2 57.08	-33 46 0.73
3	ζ Herculis	W E	2.5 ...	16 38 ..... .....	..... .....	46.75 50.10	49.45 51.50	26.118 26.118	352 50 33.22 7 6 59.18	- 0.28 + 1.59	- 0.21 + 0.21	- 6.76 + 6.76	+31 46 55.98
4	ε Ophiuchi	E W	2 ...	16 47 11.0 16 51 52.0	2 20.1 2 20.9	51.50 47.65	51.90 49.95	..... .....	28 35 0.62 331 24 10.60	+ 2.87 + 1.00	-17.12 +17.32	+ 29.42 - 29.43	+10 19 38.71
5	η Ophiuchi	W E	4 3	17 2 13.0 17 7 13.5	2 42.9 2 17.6	45.95 50.25	49.70 51.80	..... .....	305 29 7.85 54 30 0.65	+ 0.39 + 2.56	+13.32 - 9.50	-1 15.65 +1 15.68	-15 36 14.88
6	θ Ophiuchi	E W	3 ...	17 13 27.0 17 18 33.0	2 43.7 2 22.3	49.80 49.20	51.15 50.90	..... .....	63 47 21.88 296 11 50.55	+ 2.09 + 1.83	-11.49 + 8.68	+1 49.44 -1 49.47	-24 54 8.30
7	λ Herculis	W E	3.5 2.5	17 24 24.0 17 29 20.5	2 30.6 2 25.9	46.90 49.45	49.90 51.10	..... .....	347 15 12.98 12 43 58.05	+ 0.73 + 2.01	+39.18 -36.77	- 12.24 + 12.24	+26 11 19.42
8	β Ophiuchi	E W	3 ...	17 36 10.0 17 41 10.0	2 37.3 2 22.7	50.35 49.20	51.50 50.45	..... .....	34 17 51.40 325 41 22.68	+ 2.42 + 1.59	-18.57 +15.28	+ 36.95 - 36.95	+ 4 36 42.06
9	89 Herculis	W E	2.5 ...	17 49 6.5 17 54 3.5	2 29.7 2 27.3	46.85 49.00	49.90 51.25	..... .....	347 8 9.40 12 51 1.50	+ 0.77 + 1.92	+38.40 -37.17	- 12.38 + 12.39	+26 4 15.64
10	102 Herculis	E W	2.5 ...	18 2 9.0 18 7 10.5	2 33.6 2 27.9	50.15 49.95	51.55 50.70	..... .....	18 6 45.25 341 52 20.55	+ 2.35 + 1.85	-30.10 +27.91	+ 17.77 - 17.77	+20 48 18.50
11	b Draconis	E W	3 ...	18 20 4.0 18 24 56.0	2 29.9 2 22.1	50.15 49.80	51.45 50.85	..... .....	340 9 48.55 19 49 20.65	+ 2.35 + 1.94	+14.57 -13.10	- 19.58 + 19.58	+58 45 8.45
12	84 G. Sagittarii	W E	3 ...	18 30 9.0 18 34 59.0	2 35.6 2 14.4	48.75 49.35	50.45 51.10	..... .....	297 30 50.52 62 28 18.32	+ 1.45 + 1.90	+10.61 - 7.92	-1 43.84 +1 43.87	-23 35 1.86
13	204 B. Draconis	E W	2.5 ...	18 42 3.0 18 47 0.0	2 36.8 2 20.2	50.15 50.05	51.20 51.05	..... .....	346 1 18.35 13 57 48.68	+ 2.19 + 2.12	+26.07 -20.85	- 13.52 + 13.53	+52 53 22.06
14	ε Aquilæ	W E	2.5 2	18 52 47.0 18 57 34.5	2 32.7 2 14.8	49.45 49.70	50.75 51.25	..... .....	336 0 58.40 23 58 10.05	+ 1.70 + 2.06	+23.52 -18.33	- 24.18 + 24.18	+14 56 37.64
15	19 Lyræ	E W	2.5 ...	19 8 ..... .....	..... .....	50.05 51.25	51.30 51.25	25.514 25.514	7 46 27.78 352 11 45.55	+ 2.90 + 3.25	+ 0.20 - 0.20	+ 7.45 - 7.45	+31 7 48.27
16	5 Vulpeculæ	W E	2.5 ...	19 20 30.0 19 24 18.5	1 35.6 2 12.9	48.45 48.80	50.05 50.55	..... .....	340 59 15.12 19 0 9.10	+ 1.20 + 1.48	+11.20 -21.64	- 18.75 + 18.76	+19 54 47.40
17	54 Sagittarii	E W	2.5 ...	19 32 43.0 19 37 27.0	2 34.7 2 9.3	49.55 50.80	51.05 51.10	..... .....	55 24 17.40 304 34 57.12	+ 1.92 + 2.29	-11.82 + 8.26	+1 18.78 -1 18.80	-16 30 31.84
18	September 2, L. 60 Herculis	E W	2.5 ...	16 58 19.0 17 3 13.0	2 40.5 2 13.5	46.65 46.45	50.20 49.45	..... .....	26 2 14.08 333 57 6.60	+ 0.77 + 0.41	-24.27 +16.79	+ 26.06 - 26.66	+12 52 36.80
19	θ Ophiuchi	W E	3 ...	17 13 15.0 17 18 30.0	2 56.4 2 18.6	49.45 50.65	48.90 49.90	..... .....	296 11 49.05 63 47 18.55	+ 0.18 + 0.94	+13.34 - 8.24	-1 50.48 +1 50.52	-24 54 7.99
20	λ Herculis	E W	2.5 ...	17 24 16.5 17 29 9.7	2 38.9 2 14.3	51.80 53.00	50.30 50.40	..... .....	12 44 4.32 347 15 18.85	+ 1.47 + 1.77	-43.61 +31.16	+ 12.37 - 12.37	+26 11 19.28

Time.	Ther. 1904.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>mm.</i>							
24 25 22	65.6			Instrument in meridian, observation at IX with movable thread				1	359 59 38.06	
25 15	65.0	70.2	30.000	Instrument in meridian, observation at I with movable thread				2	38.22	10.62
25 16 41	81.5	84.2	29.746					3	38.22	
25 16 40	82.2							4	37.64	-15.15
25 17	81.5							5	37.05	
25 17 17	81.0							6	36.76	
25 17 27	80.9							7	38.09	-21.28
25 17 19	80.6							8	37.40	
25 17 52	80.5	82.0	29.742					9	37.42	
25 18 5	79.6							10	36.90	-21.61
25 18 21	79.5							11	37.48	
25 18 13	78.8							12	37.46	-16.98
25 18 43	78.9							13	38.28	-16.87
25 18 16	78.6	80.6	29.746					14	38.74	
25 19 12	78.1							15	36.45	-24.92
25 19 23	78.0							16	38.24	-23.44
25 19 16	77.7	79.7	29.749					17	37.58	
25 19 1	76.2	81.1	29.743					18	37.19	-16.99
25 19 16	79.1							19	36.91	
25 19 27	79.2							20	36.98	-21.91

Note.
E. Minute of clock time assumed

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	X Sagittarii	W	3	17 38 46.0	2 49.9	50.75	49.55	.....	293 18 40.78	+ 0.75	+11.80	-2 6.19	-27 47 33.25
		E	...	17 43 52.0	2 16.1	50.85	49.70	.....	66 40 27.82	+ 0.83	- 7.57	+2 6.25	
2	89 Herculis	E	3	17 49 0.5	2 36.4	52.30	50.30	.....	12 51 5.02	+ 1.54	-41.91	+ 12.51	+26 4 16.28
		W	...	17 53 54.6	2 17.7	54.05	50.85	.....	347 8 13.72	+ 2.32	+32.49	- 12.51	
3	102 Herculis	W	3	18 1 59.0	2 44.3	51.65	49.70	.....	341 52 24.00	+ 1.03	+34.44	- 17.94	+20 48 19.99
		E	...	18 7 9.0	2 25.7	50.60	50.10	.....	18 6 43.40	+ 1.00	-27.08	+ 17.94	
4	2 H. Scuti	E	3	18 21 7.0	2 41.5	52.55	49.65	.....	53 31 16.28	+ 1.29	-13.31	+1 14.18	-14 37 24.56
		W	...	18 26 10.0	2 21.5	54.60	50.95	.....	306 27 57.10	+ 2.50	+10.22	-1 14.20	
5	4 H. Scuti	W	2.5	18 34 33.0	2 32.9	52.40	49.95	.....	311 56 43.15	+ 1.37	+13.16	-1 1.00	- 9 8 24.53
		E	...	18 39 20.0	2 14.1	51.25	49.75	.....	48 2 27.62	+ 0.97	-10.13	+1 0.98	
6	ξ Sagittarii	E	3	18 49 8.0	2 57.2	52.70	50.25	.....	60 7 17.45	+ 1.63	-14.32	+1 35.22	-21 13 45.99
		W	...	18 54 30.0	2 24.8	55.10	51.50	.....	299 51 57.08	+ 2.89	+ 9.56	-1 35.24	
7	π Sagittarii	W	2.5	19 1 34.0	2 34.4	53.85	50.70	.....	299 55 21.15	+ 2.14	+10.88	-1 35.09	-21 10 21.83
		E	...	19 6 30.0	2 21.6	51.20	49.00	.....	60 3 49.78	+ 0.67	- 9.15	+1 35.13	
8	186 G. Sagittarii	W	3.5	19 18 58.0	1 59.8	54.40	51.00	.....	291 10 46.18	+ 2.39	+ 5.66	-2 20.79	-29 55 46.91
		E	...	19 23 15.0	2 17.2	52.70	50.10	.....	68 48 26.05	+ 1.50	- 7.42	+2 20.84	
9	228 G. Sagittarii	E	3	19 37 12.0	2 47.1	54.80	51.90	.....	71 0 36.12	+ 2.94	-10.61	+2 38.50	-32 8 12.12
		W	...	19 42 21.0	2 21.9	56.15	51.95	.....	288 58 36.58	+ 3.29	+ 7.65	-2 38.51	
10	c Sagittarii	W	2.5	19 54 9.0	2 41.7	54.00	50.80	.....	293 7 54.05	+ 2.26	+10.66	-2 7.99	-27 58 21.63
		E	...	19 59 14.0	2 23.3	53.30	50.75	.....	66 51 14.30	+ 2.03	- 8.37	+2 7.97	
11	68 Draconis	E	2.5	20 7 52.0	2 14.1	54.00	50.60	.....	337 7 23.05	+ 2.13	+ 9.28	- 23.22	+61 47 43.23
		W	2	20 12 29.0	2 22.9	55.90	51.50	.....	22 51 48.25	+ 3.07	-10.53	+ 23.22	
12	40 Cygni	W	2.5	20 24 ....	.....	54.75	50.90	27.625	359 10 23.48	+ 1.67	- 0.26	- 0.76	+38 7 55.95
		E	...	.....	.....	52.90	50.45	27.625	0 45 3.88	+ 1.04	+ 0.26	+ 0.76	
13	29 Vulpeculæ	E	2.5	20 31 40.5	2 38.5	54.05	50.60	.....	18 2 50.70	+ 2.10	-32.14	+ 17.96	+20 52 15.21
		W	...	20 36 44.0	2 25.0	56.05	51.60	.....	341 56 23.32	+ 3.08	+26.90	- 17.96	
14	3 Aquarii	W	3	20 40 22.0	2 23.5	55.30	51.35	.....	315 42 35.55	+ 2.78	+12.46	- 53.69	- 5 22 23.84
		E	...	20 45 6.0	2 20.5	52.85	49.65	.....	44 16 35.40	+ 1.32	-11.94	+ 53.70	
15	η Capricorni	E	2.5	20 56 17.0	2 44.9	56.45	52.25	.....	59 7 15.90	+ 3.56	-12.61	+1 31.98	-20 13 44.87
		W	...	21 1 29.0	2 27.1	55.40	51.20	.....	300 51 54.52	+ 2.81	+10.04	-1 31.99	
16	G Cephei	W	2.5	21 7 14.5	2 13.3	54.55	50.65	.....	20 40 0.85	+ 2.34	-10.81	+ 20.82	+59 35 53.59
	September 3, L.	E	...	21 11 53.0	2 25.2	55.55	51.40	.....	339 19 4.82	+ 2.89	+12.82	- 20.82	
17	η Herculis	W	3.5	16 40 ....	.....	53.35	51.05	27.340	0 9 16.32	- 0.54	- 0.27	+ 0.18	+39 6 37.81
		E	3	.....	.....	53.80	52.10	27.340	359 46 33.62	+ 0.05	+ 0.27	- 0.18	
18	ε Ursæ Minoris	E	2.5	16 53 25.0	2 19.9	55.50	52.95	.....	316 43 30.70	+ 1.68	+ 1.64	- 50.69	+82 12 9.50
		W	2	16 58 34.0	2 49.1	55.25	52.00	.....	43 15 39.18	+ 1.15	- 2.40	+ 50.70	
19	ζ Draconis	W	2.5	17 6 22.0	2 10.9	53.55	51.50	.....	26 54 20.00	+ 0.41	- 6.57	+ 27.39	+65 50 22.76
		E	...	17 11 2.0	2 29.1	53.50	51.80	.....	333 4 47.72	+ 0.56	+ 8.53	- 27.40	
20	ρ Herculis (brighter)	E	3	17 20 ....	.....	55.25	52.75	26.537	1 39 12.10	+ 2.23	+ 0.25	+ 1.58	+37 14 26.27
		W	...	.....	.....	55.90	52.25	26.537	358 17 34.68	+ 2.16	- 0.25	- 1.58	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
2 17 32	78.7	...	...	12.17. Instrument in meridian, observation at IX with movable thread.					1	359 59 37.24	- 0.03
17 41	78.5	...	...	20. Instrument in meridian, observation at I with movable thread.					2	36.59	...
17 52	77.9	79.7	29.933						3	38.40	-22.37
18 5	78.1	...	...						4	37.04	...
18 24	76.5	...	...						5	38.06	...
18 37	77.0	78.4	29.925						6	37.14	12.77
18 52	77.2	...	...						7	37.76	...
19 4	76.5	...	...						8	37.20	12.03
19 22	75.9	...	...						9	37.98	-12.06
19 40	75.2	77.1	29.919						10	37.46	...
19 57	75.6	...	...						11	37.62	-27.43
20 10	75.6	...	...						12	37.94	-26.64
20 34	75.1	76.7	29.916						13	36.98	-25.04
20 43	74.8	...	...	Notes.					14	37.79	...
20 59	74.2	...	...	3 W. One microscope reading increased 10".					15	37.10	-19.41
21 10	74.2	75.4	29.907	8 W. One microscope reading decreased 10".					16	36.46	-24.77
3 16 41	84.6	86.7	29.823						17	36.00	...
16 56	84.6	...	...						18	35.98	...
17 9	83.6	...	...						19	35.32	...
									20	34.06	-23.91

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ophiuchi	W	3	17 28 2.0	2 30.9	53.10	51.65	.....	333 42 30.62	+ 0.38	+21.29	- 26.69	+12 38 6.51
		E	...	17 32 38.0	2 5.1	53.00	51.75	.....	26 16 33.80	+ 0.41	-14.64	+ 26.71	
2	X Sagittarii	E	2	17 39 1.0	2 34.9	54.40	51.65	.....	66 40 29.62	+ 0.71	- 9.81	+2 4.70	-27 47 33.76
		W	...	17 43 52.0	2 16.1	55.70	51.80	.....	293 18 40.08	+ 1.10	+ 7.57	-2 4.75	
3	ξ Draconis	W	3	17 49 19.0	2 36.7	53.20	51.05	.....	17 57 58.95	+ 0.18	-18.44	+ 17.57	+56 53 40.52
		E	2.5	17 54 22.0	2 26.3	53.95	51.65	.....	342 1 11.80	+ 0.63	+16.07	- 17.58	
4	72 Ophiuchi	E	2.5	18 0 15.0	2 37.3	54.85	51.80	.....	29 21 22.15	+ 0.93	-21.12	+ 30.48	+ 9 33 19.08
		W	...	18 5 6.5	2 14.2	55.30	51.70	.....	330 37 51.00	+ 1.02	+15.37	- 30.49	
5	δ Sagittarii	W	4	18 12 14.0	2 42.0	54.95	51.85	.....	291 14 25.90	+ 0.93	+10.36	-2 18.33	-29 52 0.33
		E	3	18 17 16.0	2 20.0	53.30	51.15	.....	68 44 42.42	+ 0.19	- 7.74	+2 18.36	
6	2 H. Scuti	W	3	18 21 20.0	2 28.6	55.60	52.05	.....	306 27 54.65	+ 1.27	+11.27	-1 13.23	-14 37 25.03
		E	2.5	18 26 11.0	2 22.4	53.90	51.40	.....	53 31 14.35	+ 0.48	-10.35	+1 13.25	
7	4 H. Scuti	E	2.5	18 34 23.0	2 42.9	55.05	51.85	.....	48 2 30.42	+ 0.97	-14.95	+1 0.30	- 9 8 24.63
		W	...	18 39 15.0	2 9.1	56.65	52.30	.....	311 56 43.10	+ 1.60	+ 9.39	-1 0.31	
8	ξ Sagittarii	W	3	18 49 27.0	2 38.3	54.80	51.50	.....	290 51 55.15	+ 0.80	+11.43	-1 34.24	-21 13 45.64
		E	...	18 54 26.0	2 20.7	53.50	51.15	.....	60 7 12.02	+ 0.26	- 9.03	+1 34.27	
9	ϕ Sagittarii	E	3	19 7 9.0	2 35.5	54.75	51.55	.....	64 18 16.05	+ 0.72	-10.28	+1 52.52	-25 25 7.23
		W	2.5	19 12 1.0	2 16.5	56.30	51.95	.....	295 40 54.15	+ 1.35	+ 7.92	-1 52.57	
10	September 5, L. ζ Draconis	E	2.5	17 6 10.0	2 23.0	52.60	52.45	.....	333 4 49.10	+ 1.29	+ 7.85	- 28.16	+65 50 23.30
		W	...	17 11 7.0	2 34.0	53.00	52.35	.....	26 54 22.58	+ 1.32	- 9.10	+ 28.18	
11	f Draconis	W	2.5	17 29 48.0	2 35.5	51.55	51.50	.....	29 16 5.88	+ 0.61	- 7.79	+ 31.20	+68 12 11.59
		E	...	17 34 58.0	2 34.5	50.90	51.25	.....	330 43 3.65	+ 0.28	+ 7.69	- 31.21	
12	September 7, L. η Herculis	E	4	16 40 ....	...	50.60	51.50	26.388	359 47 10.38	+ 0.90	+ 0.17	- 0.18	+39 6 38.77
		W	...	...	...	52.75	52.45	...	10 55.52	+ 2.06	- 0.27	+ 0.18	
13	ρ Herculis (brighter)	W	3	17 20 ....	...	52.50	51.90	27.114	358 17 14.00	+ 0.27	- 0.25	- 1.63	+37 14 26.29
		E	...	...	...	51.85	51.80	27.114	1 38 51.60	+ 0.04	+ 0.25	+ 1.63	
14	α Ophiuchi	E	2.5	17 28 16.0	2 17.2	52.90	52.15	.....	26 16 34.72	+ 1.21	-17.60	+ 27.41	+12 38 6.47
		W	...	17 32 50.5	2 17.3	54.20	52.60	.....	333 42 33.02	+ 1.74	+17.63	- 27.42	
15	γ Ophiuchi	W	2.5	17 40 29.0	2 40.5	52.35	51.70	.....	323 49 32.20	+ 0.88	+18.50	- 40.59	+ 2 44 52.09
		E	...	17 45 4.5	1 55.0	52.35	52.30	.....	36 9 28.18	+ 1.18	- 9.50	+ 40.64	
16	ξ Draconis	E	2.5	17 40 23.0	2 33.0	52.60	52.20	.....	342 1 9.65	+ 1.17	+17.58	- 18.07	+56 53 41.61
		W	...	17 54 12.0	2 16.0	53.00	52.30	.....	17 57 54.10	+ 1.57	-13.89	+ 18.08	
17	σ Herculis	W	3	18 1 24.2	2 28.1	51.40	51.15	.....	349 49 3.72	+ 0.35	+16.21	- 10.01	+28 45 21.19
		E	...	18 6 7.5	2 15.2	51.70	52.00	...	10 9 59.22	+ 0.89	-18.52	+ 10.01	
18	δ Sagittarii	E	3.5	18 12 18.0	2 38.4	52.10	52.00	.....	68 44 40.30	+ 0.93	- 9.90	+2 22.40	-29 52 1.39
		W	...	18 17 22.0	2 25.6	53.80	52.00	.....	291 14 30.00	+ 1.34	+ 8.37	-2 22.45	
19	ϕ Sagittarii	W	2.5	18 37 21.0	2 24.0	51.55	51.50	...	294 1 2.80	+ 0.55	+ 8.57	-2 4.65	-27 5 11.83
		E	...	18 42 20.0	2 35.0	51.35	51.30	...	65 58 0.50	+ 0.37	- 9.94	+2 4.69	
20	R Lyrae	E	3	18 52	...	51.60	51.85	26.007	355 4 31.92	+ 1.45	+ 0.32	- 4.80	+43 40 37.32
		W	...	...	...	54.40	52.40	26.007	4 53 2.00	+ 2.45	- 0.32	+ 4.80	

Time	Ther- m.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below			No.	Zenith point	Red. to 1904.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>m</i>						
1 15 00	82.6	82.9	29.891	1. Instrument in meridian. E, observation at H with movable thread; W, observation at I with fixed thread.			1	39 59 35.91	
12 12	80.7			12. Instrument in meridian, observation at IX with movable thread.			2	41.01	0.04
12 13	80.7			13. Instrument in meridian, observation at I with movable thread.			3	44.59	
14 15	80.1						4	44.67	
14 15	80.1						5	46.4	
15 1	80.0	82.5	29.926				6	46.54	
15 1	80.0						7	46.6	
15 1	80.0						8	46.63	-12.76
15 1	80.0						9	46.93	
15 12 9	81.5	82.2	29.903				10	46.64	
15 15	80.3	80.8	29.903				11	45.16	-27.28
15 44	80.6	80.9	29.909				12	35.58	
15 44	80.5			Notes.			13	15.00	23.25
15 45	81.2			9 W One microscope reading increased 15".			14	15.00	
15 45	81.2			12 Vis. faint.			15	45.16	
15 46	81.1	81.2	29.946	Thermometer reading increased 20".			16	45.74	-16.42
15 52	80.8						17	45.19	
15 58	80.1						18	45.50	
15 58	80.3	80.7	29.956				19	45.94	
15 58	80.8						20	46.20	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ψ Sagittarii	W E	3 2	19 7 12.0 19 12 5.0	2 32.9 2 20.1	51.30 51.05	51.20 51.10	..... .....	295 40 56.40 64 18 12.48	+ 0.34 + 0.20	+ 9.94 - 8.35	-1 55.86 +1 55.89	-25 25 7.85
2	5 Vulpeculæ	E W	3 ...	19 19 38.5 19 24 25.0	2 28.3 2 18.2	52.40 55.05	51.40 52.95	..... .....	19 11 9.05 340 59 1.78	+ 0.77 + 2.15	-26.94 +23.39	+ 19.31 - 19.31	+19 54 49.76
3	228 G. Sagittarii	W E	3.5 ...	19 37 50.0 19 42 32.0	2 9.6 2 32.4	52.70 51.00	51.55 51.20	..... .....	288 58 40.55 71 0 33.20	+ 0.86 + 0.24	+ 6.38 - 8.82	-2 41.49 +2 41.55	-32 8 13.09
4	β Aquilæ	E W	2.5 ...	19 48 28.0 19 53 6.5	2 13.3 2 25.2	52.30 54.35	51.50 51.75	..... .....	32 44 7.25 327 14 59.45	+ 0.79 + 1.37	-13.86 +16.44	+ 36.09 - 36.10	+ 6 10 22.29
5	24 Vulpeculæ	W E	2.5 ...	20 10 24.0 20 15 2.5	2 22.1 2 16.4	52.00 50.55	51.25 51.20	..... .....	345 26 58.75 14 32 10.45	+ 0.54 + 0.21	+31.08 -28.64	- 14.58 + 14.58	+24 22 56.45
6	ρ Capricorni	E W	2.5 3.5	20 21 0.0 20 25 54.0	2 28.9 2 25.1	52.40 53.60	51.40 51.40	..... .....	57 1 10.25 302 57 59.65	+ 0.72 + 1.06	-10.66 +10.12	+1 26.39 -1 26.40	-18 7 34.29
7	29 Vulpeculæ	W E	2 ...	20 31 38.2 20 36 30.7	2 41.4 2 11.1	52.30 50.50	51.25 51.00	..... .....	341 56 19.52 18 2 39.80	+ 0.59 + 0.03	+33.33 -21.99	- 18.33 + 18.33	+20 52 16.32
8	ω Capricorni	E W	3 2.5	20 43 42.0 20 48 29.0	2 29.6 2 17.4	52.10 54.70	51.05 52.20	..... .....	66 9 18.58 293 49 50.50	+ 0.49 + 1.72	- 9.23 + 7.78	+2 6.54 -2 6.57	-27 16 24.63
9	γ^1 Cygni	W E	3 ...	20 57 ..... .....	..... .....	53.55 52.05	51.70 51.15	27.804 27.804	8 11 22.82 351 43 48.20	+ 0.44 - 0.19	- 0.36 + 0.36	+ 8.14 - 8.14	+47 9 12.25
10	September 15, L. γ Ophiuchi	E W	2.5 ...	17 40 32.5 17 45 34.0	2 37.5 2 24.0	50.95 49.80	51.40 50.00	..... .....	36 9 32.75 323 49 35.50	+ 3.64 + 2.34	-17.82 +14.89	+ 41.42 - 41.44	+ 2 44 52.49
11	ξ Herculis	W E	2.5 ...	17 54 ..... .....	..... .....	49.50 50.05	49.20 50.60	26.557 26.557	350 19 11.95 9 37 37.42	+ 1.03 + 2.35	- 0.18 + 0.18	- 9.66 + 9.66	+29 15 53.60
12	θ Herculis	E W	3 ...	18 1 21.5 18 6 20.2	2 31.4 2 27.3	50.90 49.75	50.65 49.60	..... .....	10 10 4.25 349 49 1.45	+ 3.26 + 2.08	-48.29 +45.71	+ 10.20 - 10.20	+28 45 21.65
13	ϵ Sagittarii	W E	4 ...	18 15 22.0 18 20 9.0	2 32.1 2 14.9	49.00 50.30	48.80 50.30	..... .....	286 41 35.40 73 17 30.18	+ 1.32 + 2.75	+ 8.45 - 6.65	-3 7.28 +3 7.39	-34 25 41.05
14	ϕ Sagittarii	E W	4 ...	18 37 10.0 18 42 13.0	2 35.6 2 27.4	50.95 50.30	50.60 49.60	..... .....	65 58 1.72 294 1 3.48	+ 3.26 + 2.38	-10.01 + 8.98	+2 7.04 -2 7.06	-27 5 10.28
15	R Lyrae	W E	3 ...	18 52 ..... .....	..... .....	49.30 50.35	48.85 49.95	26.755 26.755	4 52 36.12 355 4 0.05	+ 0.73 + 1.90	- 0.32 + 0.32	+ 4.89 - 4.89	+43 49 38.86
16	22 Aquilæ	E W	2.5 ...	19 9 20.0 19 14 7.0	2 31.7 2 15.3	50.95 50.30	50.50 49.75	..... .....	34 14 11.45 325 44 59.45	+ 3.13 + 2.44	-17.29 +13.76	+ 38.85 - 38.86	+ 4 40 17.16
17	21 B. Vulpeculæ	W E	2.5 ...	19 18 59.5 19 23 45.5	2 33.6 2 12.4	49.00 50.20	48.80 50.05	..... .....	345 48 41.68 14 10 16.15	+ 1.28 + 2.52	+37.11 -27.58	- 14.44 + 14.44	+24 44 46.89
18	σ Aquilæ	E W	2.5 ...	19 32 31.0 19 37 4.0	2 2.3 2 30.7	50.30 49.80	49.85 49.20	..... .....	33 43 17.92 326 15 43.45	+ 2.51 + 1.94	-11.38 +17.28	+ 38.13 - 38.15	+ 5 11 5.51
19	63 Sagittarii	W E	3 2	19 54 2.0 19 58 49.0	2 40.1 2 6.9	48.40 49.60	48.25 49.30	..... .....	307 11 27.30 52 47 36.78	+ 0.72 + 1.89	+13.25 - 8.33	-1 15.34 +1 15.39	-13 53 53.06
20	68 Draconis	W E	2 ...	20 8 5.0 20 12 47.0	2 1.9 2 40.1	..... 49.75	..... 49.10	..... .....	22 51 46.00 337 7 15.40	+ 1.11 + 1.85	- 7.66 +13.22	+ 24.21 - 24.22	+61 47 45.54

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
7 19 10	67.3	.....	.....	9.11.15. Instrument in meridian, observation at IX with movable thread.	1	359 59 35.52	.....
19 23	67.1	.....	.....		2	35.10	-25.04
19 41	66.5	68.7	29.960		3	36.24	-12.24
19 51	66.2	.....	.....		4	35.72	.....
20 13	65.9	67.8	29.956		5	36.20	.....
20 24	65.7	.....	.....		6	35.56	.....
20 35	65.5	.....	.....		7	35.64	-25.82
20 47	65.2	.....	.....		8	34.90	-17.18
20 56	64.9	67.2	29.951		9	35.86	-27.15
15 17 44	62.4	64.3	30.022		10	35.64	-16.62
18 4	61.6	.....	.....		11	35.68	-24.46
18 23	60.2	68.8	30.032		12	34.23	.....
18 40	60.5	.....	.....		13	35.78	.....
18 55	59.9	.....	.....		14	34.90	.....
19 12	59.3	.....	.....	Notes.	15	36.78	.....
19 22	59.0	60.9	30.048	3. Very faint.	16	36.46	-21.57
19 35	59.0	.....	.....	20 W. Level correction assumed.	17	35.58	-26.81
19 57	57.7	.....	.....		18	35.85	-22.53
20 11	56.9	.....	.....		19	35.83	-18.00
					20	34.96	-30.60

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	42 Cygni	E	2	20 26		50.00	49.00	26.163	2 45 22.70	+ 2.66	+ 0.24	+ 2.78	+36 8 31.12
		W	...	...	...	49.60	48.95	26.163	357 11 57.52	+ 2.46	- 0.24	- 2.79	
2	β Delphini	W	3	20 30 34.5	2 34.5	48.85	48.40		335 20 26.78	+ 0.99	+23.53	- 26.33	+14 16 5.64
		E	...	20 35 37.8	2 28.8	49.70	49.10		24 38 41.08	+ 1.80	-21.83	+ 26.31	
3	ω Capricorni	W	2	20 43 44.0	2 28.1	49.70	48.40		293 49 52.08	+ 1.50	+ 9.04	-2 9.15	-27 16 25.20
		E	...	20 48 33.0	2 20.9	50.35	48.85		66 9 14.50	+ 2.03	- 8.18	+2 9.19	
4	f^1 Cygni	E	2	20 57		50.45	49.00	25.293	351 45 26.15	+ 2.90	+ 0.36	- 8.31	+47 9 13.60
		W	...	...	...	50.25	48.70	25.293	8 13 4.05	+ 2.63	- 0.36	+ 8.31	
5	G Cephei	E	2	21 7 10.5	2 18.2	50.25	48.75		339 19 2.60	+ 1.92	+11.61	- 21.69	+59 35 57.81
		W	...	21 11 56.5	2 27.8	49.80	48.20		20 40 6.52	+ 1.46	-13.29	+ 21.69	
6	b Capricorni	W	2.5	21 20 35.0	2 46.5	49.55	48.20		298 52 37.98	+ 1.27	+12.44	-1 43.80	-22 13 11.54
		E	...	21 25 36.0	2 14.5	50.45	49.10		61 6 26.80	+ 2.18	- 8.12	+1 43.80	
7	13 H. Cephei	E	2	21 33 26.0	2 40.1	50.75	49.30		341 51 6.80	+ 2.47	+18.99	- 18.84	+57 3 43.21
		W	...	21 38 38.0	2 31.9	49.95	48.20		18 7 58.88	+ 1.54	-17.10	+ 18.84	
8	September 16, L. ϵ Herculis	E	3	17 54		51.20	50.50	27.008	9 37 17.88	+ 3.18	+ 0.18	+ 9.51	+29 15 52.80
		W	...	...	...	50.70	49.85	27.008	350 18 49.78	+ 2.58	- 0.18	- 9.51	
9	δ Ursæ Minoris	W	3	18 2 6.0	1 2.5	49.95	49.10		47 40 31.30	+ 1.07	- 0.13	+1 1.46	+86 37 15.35
		E	...	18 6 16.0	3 7.5	50.80	50.30		312 18 34.90	+ 2.11	+ 1.19	-1 1.52	
10	ϵ Sagittarii	E	4	18 15 18.0	2 36.1	51.40	50.95		73 17 34.68	+ 2.80	- 8.90	+3 4.65	-34 25 41.56
		W	...	18 20 11.0	2 16.9	50.45	49.75		286 41 32.60	+ 1.70	+ 6.85	-3 4.73	
11	α Lyrae	W	3	18 34		49.40	48.65	27.894	359 44 22.78	- 0.17	- 0.27	- 0.21	+38 42 7.06
		E	...	...	...	50.50	49.85	27.894	0 10 40.20	+ 1.01	+ 0.27	+ 0.21	
12	111 Herculis	E	3	18 40 10.0	2 42.3	50.80	49.95		20 50 5.18	+ 2.01	-29.87	+ 21.41	+18 4 52.36
		W	...	18 45 8.0	2 15.7	50.30	49.35		339 9 8.90	+ 1.41	+20.88	- 21.42	
13	ζ Aquilæ	W	3	18 58 30.0	2 35.5	49.15	48.30		334 47 59.30	+ 0.31	+23.42	- 26.49	+13 43 37.68
		E	...	19 3 36.0	2 30.5	50.65	50.05		25 11 8.35	+ 1.94	-21.93	+ 26.50	
14	22 Aquilæ	W	2.5	19 9 20.0	2 31.7	50.25	49.10		325 44 55.65	+ 1.24	+17.30	- 38.34	+ 4 40 16.44
		E	...	19 14 18.5	2 26.8	50.60	49.75		34 14 12.80	+ 1.71	-16.20	+ 38.34	
15	21 B. Vulpeculæ	E	...	19 18 56.3	2 36.7	51.00	50.00		14 10 25.68	+ 2.06	-38.64	+ 14.24	+24 44 47.42
		W	...	19 23 50.0	2 17.0	50.35	48.95		345 48 48.00	+ 1.21	+29.53	- 14.24	
16	σ Aquilæ	W	3	19 32 6.0	2 27.3	49.90	48.50		326 15 45.95	+ 0.79	+16.51	- 37.60	+ 5 11 6.05
		E	...	19 37 4.5	2 31.2	50.55	49.45		33 43 25.40	+ 1.60	-17.39	+ 37.62	
17	β Aquilæ	W	3	19 48 7.0	2 34.8	49.90	48.45		327 14 59.42	+ 0.74	+18.69	- 36.25	+ 6 10 22.91
		E	...	19 52 49.0	2 7.2	50.65	49.50		32 44 5.12	+ 1.70	-12.62	+ 36.26	
18	τ Aquilæ	E	3	19 57 4.0	2 29.0	50.75	49.55		31 53 44.85	+ 1.76	-17.69	+ 35.10	+ 7 0 48.56
		W	...	20 2 3.0	2 30.0	49.90	48.50		328 5 23.88	+ 0.78	+17.93	- 35.12	
19	68 Draconis	W	3	20 7 58.0	2 8.9	49.70	48.65		22 51 48.75	+ 0.78	- 8.57	+ 23.82	+61 47 46.58
		E	2	20 12 34.0	2 27.1	50.15	49.20		337 7 16.72	+ 1.25	+11.16	- 23.82	
20	40 Cygni	E	2.5	20 24		50.55	49.35	25.426	0 46 28.20	+ 2.24	+ 0.26	+ 0.77	+38 7 58.24
		W	...	...	...	49.90	48.60	25.426	359 11 53.72	+ 1.58	- 0.26	- 0.78	

Time	Ther. 3892	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>									
15 20 23	57.4	59.6	30.064	1.4.8.20	Instrument in meridian, observation at I with movable thread					1	359 59 35.88	-29.01
20 34	57.4			11	Instrument in meridian, observation at IX with movable thread					2	36 16	
20 47	56.9									3	35.50	-16.51
21 19	56.3									4	35.54	-29.09
21 24	56.3	58.7	30.058							5	35.41	-28.60
21 36	56.3									6	36.28	-19.15
19 12 5	56.4	59.1	29.913							7	35.79	-27.27
18 15	56.1									8	34.43	-24.49
18 12	56.1									9	35.19	
18 11	56.2									10	34.82	
18 11	56.1	56.4	29.900							11	35.81	
19 1	56.3									12	34.25	-24.12
19 12	56.6									13	35.70	
19 22	56.7									14	36.25	-21.62
19 35	56.9	56.9	29.914							15	34.92	-20.92
19 42	56.2									16	36.44	-22.57
20 9	56.9									17	36.53	
20 11	56.6									18	35.74	
										19	35.04	-10.81
										20	35.98	-29.43

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	δ Delphini	W E	3 ...	20 36 29.0 20 41 21.0	2 35.8 2 16.2	49.10 50.15	48.05 49.20	..... .....	335 48 32.92 24 10 30.92	+ 0.10 + 1.22	+24 32 -18.59	- 25.37 + 25.37	+14 44 13.36
2	μ Aquarii	E W	3 ...	20 45 22.0 20 49 43.0	2 12.9 2 8.1	50.50 50.20	49.40 48.90	..... .....	48 14 13.62 311 44 56.82	+ 1.49 + 1.12	- 9.91 + 9.21	+1 3.26 -1 3.27	- 9 20 15.45
3	δ Ursæ Minoris S. P.	W E	4 ...	6 1 18.0 6 10 34.0	1 50.3 7 25.7	49.80 49.55	47.75 47.45	..... .....	54 25 40.65 305 33 35.78	+ 0.88 + 0.60	+ 0.37 - 6.10	+1 19.91 -1 19.91	+86 37 17.44
4	α September 20, L. Lyrae	E W	2 ...	18 34 ..... .....	..... .....	50.20 51.10	51.65 52.10	25.247 25.247	0 12 27.50 359 46 7.25	+ 1.53 + 2.34	+ 0.27 - 0.27	+ 0.21 - 0.21	+38 42 6.64
5	III Herculis	W E	2 ...	18 40 6.5 18 45 13.0	2 45.8 2 20.7	50.30 50.00	51.60 51.50	..... .....	339 8 59.38 20 50 0.52	+ 0.87 + 0.71	+31.17 -22.44	- 21.02 + 21.04	+18 4 52.12
6	ζ Aquilæ	E W	2 ...	18 58 28.3 19 3 35.5	2 37.2 2 30.0	50.25 51.05	51.40 52.20	..... .....	25 11 9.98 334 47 57.48	+ 0.75 + 1.62	-23.93 +21.79	+ 26.01 - 26.02	+13 43 37.87
7	d Sagittarii	W E	1.5 ...	19 9 27.0 19 14 22.0	2 40.2 2 14.8	50.25 49.80	51.50 51.30	..... .....	301 58 21.38 58 0 43.88	+ 0.74 + 0.44	+12.13 - 8.59	-1 28.37 +1 28.38	-19 7 12.28
8	δ Aquilæ	E W	1.5 2.5	19 18 13.5 19 23 6.0	2 31.8 2 20.7	50.00 50.80	51.30 52.00	..... .....	35 58 42.02 324 0 27.38	+ 0.54 + 1.29	-16.62 +14.28	+ 40.15 - 40.15	+ 2 55 45.20
9	51 B. Cygni	W E	2.5 ...	19 33 ..... .....	..... .....	49.95 49.55	51.35 51.00	27.488 27.488	4 32 25.30 355 23 12.75	- 0.22 - 0.54	- 0.32 + 0.32	+ 4.43 - 4.43	+43 29 57.38
10	ζ Sagittæ	E W	2 ...	19 42 12.0 19 47 10.5	2 36.9 2 21.6	50.20 51.05	51.50 52.15	..... .....	20 0 28.60 339 58 42.98	+ 0.73 + 1.51	-28.85 +23.50	+ 20.18 - 20.18	+18 54 30.42
11	τ Aquilæ	W E	2 3	19 57 1.0 20 1 51.0	2 32.0 2 18.0	50.00 49.75	51.40 51.30	..... .....	328 5 22.50 31 53 44.45	+ 0.63 + 0.47	+18.41 -15.18	- 34.47 + 34.47	+ 7 0 48.27
12	30 Cygni	E W	3 ...	20 10 ..... .....	..... .....	50.35 50.70	51.75 52.00	25.508 25.508	352 22 30.70 7 35 41.50	+ 1.65 + 2.05	+ 0.36 - 0.36	- 7.41 + 7.41	+46 31 59.49
13	δ Ursæ Minoris S. P.	W E	4 ...	5 55 10.0 6 1 22.0	7 56.7 1 44.7	51.10 48.90	52.30 50.50	..... .....	54 25 32.15 305 33 33.12	+ 2.65 + 0.61	+ 6.97 - 0.34	+1 20.32 -1 20.37	+86 37 18.62
14	δ Ursæ Minoris	E W	2 ...	18 1 4.0 18 6 38.0	2 2.6 3 31.4	47.55 53.20	49.95 55.50	..... .....	312 18 40.38 47 40 30.05	+ 0.45 + 6.17	+ 0.51 - 1.51	-1 2.68 +1 2.69	+86 37 16.21
15	η Serpentis	W E	3 3.5	18 14 5.0 18 18 40.0	2 21.1 2 13.9	50.25 50.60	52.80 52.75	..... .....	318 9 46.82 41 49 21.42	+ 3.35 + 3.48	+12.65 -11.39	- 51.16 + 51.18	- 2 55 9.68
16	6 H. Scuti	E W	2.5 3.5	18 40 3.0 18 44 24.0	2 7.7 2 13.3	51.95 51.25	53.60 52.65	..... .....	43 44 50.62 316 14 17.35	+ 4.58 + 3.71	- 9.97 +10.86	+ 54.94 - 54.97	- 4 50 44.77
17	γ Lyrae	W E	2.5 ...	18 55 ..... .....	..... .....	50.40 51.45	52.15 53.45	27.787 27.787	353 36 22.25 6 18 49.48	+ 2.28 + 3.51	- 0.22 + 0.22	- 6.40 + 6.40	+32 33 55.99
18	d Sagittarii	E W	3.5 ...	19 9 32.0 19 14 15.0	2 35.3 2 7.7	52.20 51.20	54.05 52.80	..... .....	58 0 40.55 301 58 29.68	+ 4.92 + 3.77	-11.40 + 7.70	+1 31.95 -1 31.99	-19 7 11.59
19	δ Aquilæ	W E	3.5 3	19 18 25.0 19 23 3.0	2 20.4 2 17.6	50.05 51.95	51.85 53.85	..... .....	324 0 32.90 35 58 37.25	+ 2.69 + 4.68	+14.22 -13.66	- 41.79 + 41.80	+ 2 55 45.82
20	51 B. Cygni	E W	2.5 ...	19 33 ..... .....	..... .....	51.35 51.85	53.00 53.40	25.628 25.628	355 24 26.60 4 33 38.22	+ 4.67 + 5.20	+ 0.32 - 0.32	- 4.62 + 4.62	+43 29 57.22

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				
16 20 39	62.2	...	...	4. 12. 20. Instrument in meridian, observation at I with movable thread	1	359 59 35.44	25.98
20 49	61.9	64.6	29.906	9. 17. Instrument in meridian, observation at IX with movable thread.	2	30.17	...
6 4	55.2	56.8	29.882		3	36.09	...
20 18 32	72.5	...	...		4	35.11	...
18 44	71.6	73.7	29.804		5	35.12	24.21
19 1	71.2	...	...		6	34.84	...
19 13	70.9	...	...		7	35.00	...
19 21	71.0	...	...		8	34.44	...
19 38	70.7	72.6	29.812		9	35.96	-30.52
19 46	70.5	...	...		10	34.24	-26.45
20 0	70.5	...	...		11	35.64	...
20 15	70.0	71.9	29.815		12	34.41	-30.95
5 56	54.5	59.1	29.996		13	37.56	...
6 16	53.7	56.7	30.006		14	38.03	...
21 18 4	60.1	62.1	30.116	Note. 3. Very faint; poor.	15	38.18	...
18 17	59.6	...	...		16	38.56	-17.31
18 43	57.6	...	...		17	38.28	...
18 53	57.4	59.8	30.124		18	37.59	...
19 13	56.3	...	...		19	39.04	...
19 21	56.3	...	...		20	38.72	30.62

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Sagittæ	W	3	19 42 18.0	2 31.0	51.00	52.80	.....	339 58 43.68	+ 3.68	+26.74	- 21.01	+18 54 30.24
		E	...	19 47 18.5	2 29.5	50.85	52.65	.....	20 0 27.95	+ 3.51	-26.21	+ 21.03	
2	269 G. Sagittarii	E	3	19 55 42.0	2 27.4	51.50	53.00	.....	61 44 52.80	+ 4.05	- 9.64	+1 47.10	-22 51 39.32
		W	3.5	20 0 28.0	2 18.6	51.80	53.35	.....	298 14 16.28	+ 4.34	+ 8.52	-1 47.14	
3	30 Cygni	W	2.5	20 10 .....	.....	51.40	52.90	27.296	7 34 31.25	+ 3.20	- 0.36	+ 7.72	+46 32 0.44
		E	...	.....	.....	51.05	52.75	27.296	352 21 19.02	+ 2.97	+ 0.36	- 7.73	
4	ω ¹ Cygni	E	3.5	20 27 .....	.....	51.55	53.00	25.224	350 16 29.70	+ 4.78	+ 0.38	9.91	+48 38 14.32
		W	...	.....	.....	52.00	53.65	25.224	9 42 4.95	+ 5.43	- 0.38	+ 9.90	
5	δ Delphini	E	3	20 36 19.5	2 45.4	51.40	52.80	.....	24 10 36.85	+ 3.88	-27.41	+ 25.98	+14 44 14.80
		W	...	20 41 17.5	2 12.6	51.95	53.15	.....	335 48 39.25	+ 4.34	+17.62	- 25.99	
6	μ Aquarii	W	3	20 45 21.0	2 14.0	51.60	52.95	.....	311 44 56.78	+ 4.07	+10.08	-1 4.76	- 9 20 15.94
		E	...	20 50 2.0	2 27.0	51.55	52.95	.....	48 14 15.10	+ 4.00	-12.13	+1 4.76	
7	θ Capricorni	E	3	20 58 8.0	2 31.6	51.90	53.25	.....	56 30 5.55	+ 4.45	-11.14	+1 27.30	-17 36 31.88
		W	3.5	21 2 50.0	2 10.4	51.90	53.50	.....	303 29 3.28	+ 4.52	+ 8.24	-1 27.32	
8	4 Piscis Australis	W	3.5	21 9 46.0	2 27.8	51.10	52.60	.....	288 32 49.58	+ 3.64	+ 8.24	-2 50.86	-32 34 10.37
		E	...	21 14 28.0	2 14.2	51.90	53.35	.....	71 26 16.55	+ 4.40	- 6.79	+2 50.86	
9	δ Ursæ Minoris S. P.	E	2	5 56 6.0	7 0.4	49.05	49.15	.....	305 33 39.20	+ 0.21	- 5.42	-1 23.46	+86 37 18.22
		W	3	6 1 40.0	1 26.4	49.95	50.20	.....	54 25 35.48	+ 1.20	+ 0.23	+1 23.50	
10	δ Ursæ Minoris S. P.	W	3	6 5 4.0	1 57.6	49.95	50.05	.....	54 25 34.78	+ 1.12	+ 0.42	+1 23.52	+86 37 18.70
		E	...	6 9 10.0	6 3.6	49.05	49.35	.....	305 33 37.88	+ 0.62	- 4.06	-1 23.52	
11	September 22, L. θ Herculis	E	3	17 53 .....	.....	49.20	51.20	26.858	1 37 13.38	+ 1.65	+ 0.25	+ 1.67	+37 16 12.20
		W	...	.....	.....	49.05	50.75	26.858	358 19 8.25	+ 1.34	- 0.25	- 1.67	
12	δ Ursæ Minoris	W	2	17 57 34.0	5 32.1	48.75	50.25	.....	47 40 32.25	+ 0.16	- 3.72	+1 3.89	+86 37 15.46
		E	2.5	18 2 6.0	1 0.1	49.25	51.00	.....	312 18 38.35	+ 0.81	+ 0.12	-1 3.94	
13	δ Ursæ Minoris	E	2	18 5 32.0	2 25.9	49.40	51.10	.....	312 18 37.95	+ 0.94	+ 0.72	-1 3.97	+86 37 15.53
		W	...	18 9 28.0	6 21.9	49.15	50.95	.....	47 40 33.20	+ 0.72	- 4.93	+1 4.03	
14	September 23, L. θ Herculis	W	3.5	17 53 .....	.....	48.40	50.60	26.857	358 19 11.45	- 0.15	- 0.25	- 1.66	+37 16 13.05
		E	...	.....	.....	48.35	50.60	26.857	1 37 15.22	- 0.17	+ 0.25	+ 1.66	
15	δ Ursæ Minoris	E	2	18 1 4.0	2 1.8	48.50	50.70	.....	312 18 36.62	+ 0.65	+ 0.50	-1 3.08	+86 37 16.25
		W	3	18 6 12.0	3 6.2	49.15	51.10	.....	47 40 30.40	+ 1.18	- 1.17	+1 3.12	
16	γ Serpentis	E	3	18 14 15.0	2 11.1	48.25	50.50	.....	41 49 19.82	+ 0.46	-10.92	+ 51.49	- 2 55 9.68
		W	...	18 18 34.0	2 7.9	49.05	51.15	.....	318 9 47.72	+ 1.24	+10.39	- 51.52	
17	6 H. Scuti	W	3	18 39 31.0	2 39.6	47.95	50.20	.....	316 14 13.52	+ 0.21	+15.57	- 55.22	- 4 50 45.19
		E	...	18 44 15.0	2 4.4	48.05	50.40	.....	43 44 52.08	+ 0.28	- 9.46	+ 55.23	
18	γ Lyrae	E	3	18 55 .....	.....	48.45	50.65	25.421	6 20 25.20	+ 1.32	+ 0.22	+ 6.43	+32 33 55.44
		W	...	.....	.....	49.00	50.95	25.421	353 37 55.25	+ 1.79	- 0.22	- 6.43	
19	8 Cygni	W	2.5	19 28 .....	.....	49.20	51.15	29.534	355 16 36.50	+ 0.52	- 0.22	- 4.72	+34 15 24.30
		E	...	.....	.....	48.60	50.60	29.534	4 36 12.18	+ 0.02	+ 0.22	+ 4.72	
20	f Sagittarii	E	3	19 38 10.0	2 42.0	49.00	50.70	.....	58 52 42.42	+ 0.91	-12.22	+1 35.53	-19 59 15.64
		W	...	19 43 10.0	2 18.0	49.00	50.90	.....	301 6 27.40	+ 1.00	+ 8.87	-1 35.57	

Time	Ther.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>			<i>m</i>			<i>° ' "</i>	
21 39 16	55.6		30.131	Instrument in meridian, observation at IX with movable thread.	1	159 59 39.68	-26.48
21 39 16	55.6	57.9	30.131	Instrument in meridian, observation at I with movable thread.	2	38.16	15.69
21 39 16	55.6		30.131		3	37.70	11.68
21 39 16	54.1		30.131		4	37.28	11.07
21 39 16	54.1		30.131		5	37.26	26.16
21 39 16	54.1	56.2	30.131		6	38.95	
21 39 16	54.1		30.131		7	37.44	
21 39 16	54.1	44.0	30.131		8	37.81	
21 39 16	54.1	44.0	30.131		9	35.47	
21 39 16	54.1	44.0	30.131		10	35.18	
21 39 16	54.1	44.0	30.131		11	35.00	
21 39 16	54.1	44.0	30.131		12	35.00	
21 39 16	54.1	44.0	30.131		13	34.31	
21 39 16	54.1	44.0	30.131		14	34.77	
21 39 16	54.1	44.0	30.131		15	34.11	
21 39 16	54.1	44.0	30.131		16	34.14	
21 39 16	54.1	44.0	30.131		17	34.10	-17.27
21 39 16	54.1	44.0	30.131		18	34.69	
21 39 16	54.1	44.0	30.131		19	35.48	-20.32
21 39 16	54.1	44.0	30.131		20	34.17	15.91

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	269 G. Sagittarii	W E	2.5 3	19 55 29.0 20 0 28.0	2 40.3 2 18.7	48.40 48.40	50.00 50.20	..... .....	298 14 15.52 61 44 51.38	+ 0.35 + 0.36	+ 11.40 - 8.54	- 1 47.36 + 1 47.38	- 22 51 38.51
2	o ¹ Cygni	E W	3 ...	20 11 ..... .....	..... .....	48.55 48.80	50.35 50.50	25.032 25.032	352 27 19.00 7 31 31.30	+ 1.28 + 1.49	+ 0.36 - 0.36	- 7.67 + 7.66	+ 46 27 30.39
3	ω ¹ Cygni	W E	3 ...	20 27 ..... .....	..... .....	48.20 48.05	50.20 50.05	27.840 27.840	9 40 21.12 350 14 45.60	- 0.51 - 0.62	- 0.38 + 0.38	+ 9.92 - 9.92	+ 48 38 14.19
4	6 H. Cephei	E W	3 ...	20 40 19.0 20 45 29.0	2 45.7 2 24.3	48.50 49.00	50.35 50.70	..... .....	341 40 13.48 18 18 48.28	+ 0.58 + 0.92	+ 20.05 15.21	- 19.20 + 19.20	+ 57 14 35.97
5	θ Capricorni	W E	3 ...	20 58 2.0 21 2 58.0	2 37.6 2 18.4	48.20 48.05	50.40 49.80	..... .....	303 29 0.48 56 30 4.25	+ 0.36 + 0.06	+ 12.04 - 9.29	- 1 27.45 + 1 27.46	- 17 36 31.69
6	4 Piscis Australis	E W	3.5 ...	21 9 36.0 21 14 30.0	2 37.8 2 16.2	48.20 48.80	50.15 50.50	..... .....	71 26 18.40 288 32 51.12	+ 0.20 + 0.72	- 9.39 + 7.00	+ 2 51.18 - 2 51.22	- 32 34 9.55
7	δ Ursæ Minoris S.P.	E W	2 ...	5 56 23.0 6 1 38.0	6 42.6 1 27.6	48.00 48.70	49.05 50.15	..... .....	305 33 36.58 54 25 37.10	+ 0.00 + 0.92	- 4.97 + 0.24	- 1 21.43 + 1 21.45	+ 86 37 18.41
8	δ Ursæ Minoris S.P.	W E	2	6 5 23.0 6 10 20.0	2 17.4 7 14.4	48.70 48.05	49.95 49.25	..... .....	54 25 37.88 305 33 38.22	+ 0.82 + 0.13	+ 0.58 - 5.78	+ 1 21.47 - 1 21.49	+ 86 37 18.33
9	September 25, L. 35 Draconis S.P.	E W	2.5 ...	5 51 12.0 5 56 7.0	2 34.1 2 20.9	48.15 49.00	52.40 53.30	..... .....	295 55 49.15 64 3 17.38	+ 0.76 + 1.63	- 2.52 + 2.11	- 1 54.61 + 1 54.71	+ 76 59 1.65
10	δ Ursæ Minoris S.P.	W E	3 ...	6 0 18.0 6 3 36.0	2 46.9 0 31.1	48.85 47.85	53.15 52.05	..... .....	54 25 39.30 305 33 28.98	+ 1.48 + 0.40	+ 0.86 - 0.03	+ 1 18.31 - 1 18.34	+ 86 37 18.70
11	September 27, L. δ Ursæ Minoris	W E	■ ...	17 59 4.0 18 3 14.0	4 0.3 0 9.7	51.25 50.55	51.40 50.95	..... .....	47 40 34.62 312 18 34.80	+ 0.75 + 0.16	- 1.95 0.00	+ 1 0.39 - 1 0.46	+ 86 37 16.49
12	15 Vulpeculæ	E W	3 ...	19 55 7.0 19 59 28.0	2 7.8 2 13.2	51.65 52.35	51.85 52.45	..... .....	11 25 23.35 348 33 39.15	+ 1.21 + 1.89	- 31.03 + 33.71	+ 11.24 - 11.25	+ 27 29 46.19
13	o ¹ Cygni	W E	3.5 ...	20 11 ..... .....	..... .....	51.70 51.20	52.05 51.55	28.452	7 29 13.82 352 27 27.10	+ 0.61 + 0.11	- 0.36 + 0.36	+ 7.36 - 7.36	+ 46 27 30.79
14	θ Cephei	E W	3.5 ...	20 25 29.0 20 30 41.0	2 35.7 2 30.3	51.50 52.40	51.65 52.60	..... .....	336 14 15.50 23 44 53.35	+ 1.07 + 1.96	+ 11.72 - 11.81	- 24.51 + 24.52	+ 62 40 48.95
15	7 Aquarii	W E	3 ...	20 49 14.0 20 54 11.0	2 35.2 2 21.8	51.55 50.95	51.90 51.15	..... .....	311 1 32.50 48 57 33.02	+ 1.20 + 0.50	+ 13.34 - 11.14	- 1 4.02 + 1 4.05	- 10 3 34.87
16	September 29, L. f Sagittarii	W E	4 ...	19 38 8.0 19 43 18.0	2 44.1 2 25.9	47.65 48.60	48.60 49.25	..... .....	301 6 20.02 58 52 47.25	+ 0.77 + 1.57	+ 12.54 - 9.91	- 1 30.84 + 1 30.82	- 19 59 16.79
17	15 Vulpeculæ	W E	3.5 ...	19 55 48.2 20 0 30.3	1 26.6 3 15.5	47.95 48.65	48.90 49.40	..... .....	348 34 1.02 11 26 6.10	+ 1.11 + 1.72	+ 14.25 - 12.54	- 11.11 + 11.12	+ 27 29 46.27
18	4 Capricorni	E W	3.5 ...	20 9 33.0 20 14 42.0	2 56.5 2 12.5	49.00 48.10	49.70 48.95	..... .....	60 59 33.42 298 59 39.80	+ 2.03 + 1.18	- 14.00 + 7.89	+ 1 38.72 - 1 38.71	- 22 6 8.17
19	θ Cephei	W E	3.5 3	20 25 30.5 20 30 48.0	2 34.2 2 43.3	47.50 48.45	48.45 49.25	..... .....	23 44 54.90 336 14 12.60	+ 0.59 + 1.54	- 11.49 + 12.89	+ 24.18 - 24.18	+ 62 40 49.49

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
23 19 58	55.2	.....	.....	2. Instrument in meridian, observation at I with movable thread.					1	359 59 35.24	- 14.92
20 9	55.0	.....	.....	3. Instrument in meridian, observation at IX with movable thread.					2	33.55	.....
20 30	54.7	56.9	30.216	13. Instrument in meridian; W. observation at IX with movable thread; E. observation at IX with fixed thread.					3	34.48	- 31.36
20 43	54.6	.....	.....						4	34.05	- 31.43
21 1	54.2	.....	.....						5	33.96	.....
21 12	53.9	56.3	30.206						6	34.00	.....
5 59	49.3	51.4	30.084						7	34.94	.....
6 11	49.0	51.6	30.084						8	35.92	.....
25 5 54	63.3	64.9	29.728						9	35.30	.....
6 6	62.2	.....	.....						10	34.48	.....
6 17	61.7	63.0	29.721						11	34.16	.....
27 17 58	72.9	73.9	29.766						12	34.14	- 28.93
18 11	71.2	.....	.....						13	34.16	.....
19 58	68.5	70.1	29.792						14	35.90	.....
20 9	68.2	.....	.....						15	34.72	- 20.66
20 29	67.5	.....	.....						16	36.11	- 14.86
20 53	66.8	68.7	29.806						17	35.84	- 29.12
29 19 41	72.8	74.7	29.739						18	35.16	- 15.52
19 59	73.2	.....	.....						19	35.52	.....
20 13	73.4	.....	.....						
20 29	73.1	74.6	29.722								

Note.
12-15. Clouds.

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	6 H. Cephei	W	3	20 40 32.5	2 32.2	47.60	48.45	.....	18 18 54.28	+ 0.64	-16.92	+ 18.21	+57 14 37.96
		E	...	20 45 33.0	2 28.3	48.35	49.05	.....	341 40 14.72	+ 1.38	+16.06	- 18.21	
2	7 Aquarii	E	3.5	20 49 36.0	2 13.3	48.55	49.20	.....	48 57 32.78	+ 1.55	- 9.84	+1 3.07	-10 3 35.37
		W	...	20 55 10.0	3 20.7	47.55	48.45	.....	311 1 23.28	+ 0.64	+22.30	-1 3.07	
3	f ² Cygni	W	3	21 3 ..... .....	.....	47.20	48.30	27.837 27.837	8 18 25.58 351 36 41.08	- 0.38 + 0.53	- 0.36 + 0.36	+ 8.07 8.07	+47 16 16.33
4	γ Cygni	E	3	21 14 ..... .....	.....	48.45	49.15	25.108 25.108	4 24 29.02 355 34 19.68	+ 2.01 + 1.23	+ 0.15 - 0.15	+ 4.25 4.25	+34 30 7.37
5	9 Cygni	W	3	21 26 ..... .....	.....	46.95	48.20	28.473 28.473	7 9 17.38 352 44 59.40	- 0.53 + 0.38	- 0.35 + 0.35	+ 6.96 6.96	+46 7 31.97
6	κ Pegasi	E	2.5	21 37 50.0	2 34.6	49.15	49.95	.....	13 42 34.20	+ 2.19	-38.70	+ 13.43	+25 12 40.92
		W	...	21 43 2.5	2 37.9	48.20	48.90	.....	346 16 31.20	+ 1.18	+40.36	- 13.44	
7	13 Cephei	W	2.5	21 49 24.5	2 22.6	47.50	48.35	.....	17 14 10.95	+ 0.52	-16.21	+ 17.08	+56 9 52.85
		E	...	21 54 5.5	2 18.4	48.50	49.45	.....	342 44 59.48	+ 1.62	+15.27	- 17.08	
8	γ Aquarii	W	3.5	22 14 4.0	2 44.7	47.05	48.30	.....	319 12 56.35	+ 0.30	+17.61	- 47.44	- 1 51 52.73
		E	...	22 20 6.0	3 17.3	48.70	49.75	.....	40 46 21.92	+ 1.85	-25.28	+ 47.44	
9	September 30, L. δ Ursæ Minoris	E	4	18 3 32.0	0 28.8	50.95	53.80	.....	312 18 31.98	+ 4.09	+ 0.03	- 59.68	+86 37 16.01
		W	...	18 8 18.0	5 14.8	50.00	52.60	.....	47 40 35.40	+ 3.00	- 3.35	+ 59.72	
10	χ Draconis	W	3	18 21 16.0	1 34.5	47.95	50.40	.....	33 45 41.50	+ 0.87	- 2.03	+ 36.46	+72 41 57.81
		E	...	18 25 19.0	2 28.5	48.10	50.95	.....	326 13 25.10	+ 1.21	+ 5.00	- 36.48	
11	23 H. Camelop. s. p.	E	3.5	18 30 12.0	0 10.1	48.25	51.40	.....	298 36 14.42	+ 1.54	- 0.01	-1 39.79	+79 39 43.19
		W	...	18 34 2.0	4 0.1	48.50	51.40	.....	61 22 49.68	+ 1.61	+ 4.99	+1 39.84	
12	43 Camelop. s. p.	W	4	18 41 12.0	2 17.1	48.00	50.80	.....	72 1 52.58	+ 1.10	+ 3.01	+2 46.88	+68 59 35.71
		E	...	18 45 35.0	2 5.9	47.60	50.15	.....	287 57 17.58	+ 0.54	- 2.53	-2 46.94	
13	51 H. Cephei s. p.	E	3.5	18 53 18.0	2 42.1	47.45	50.45	.....	306 7 40.38	+ 0.63	- 0.68	-1 14.89	+87 11 32.28
		W	...	18 59 6.0	3 5.9	48.40	51.50	.....	53 51 29.72	+ 1.64	+ 0.89	+1 14.97	
14	κ Cygni	W	3	19 12 32.6	2 25.8	48.70	51.40	.....	14 16 25.08	+ 1.71	-21.91	+ 14.00	+53 12 0.25
		E	...	19 17 19.0	2 20.6	47.65	50.00	.....	345 42 45.22	+ 0.47	+20.38	- 14.02	
15	8 Cygni	E	...	19 28 ..... .....	.....	47.05	49.85	31.004 31.004	4 35 13.25 355 15 35.95	+ 0.84 + 2.68	+ 0.22 - 0.22	+ 4.50 4.50	+34 15 24.38
16	October 1, L. δ Ursæ Minoris	W	4	18 1 6.0	1 56.7	49.00	52.00	.....	47 40 34.35	+ 0.08	- 0.46	+1 0.19	+86 37 16.40
		E	...	18 5 4.0	2 1.3	49.10	51.95	.....	312 18 34.62	+ 0.11	+ 0.50	-1 0.21	
17	φ Draconis	E	3	18 20 29.0	1 42.3	48.95	51.95	.....	327 37 41.50	+ 0.08	+ 2.66	- 34.87	+71 17 42.22
		W	...	18 24 39.0	2 27.7	49.60	52.75	.....	32 21 30.00	+ 0.81	- 5.54	+ 34.88	
18	43 Camelop. s. p.	E	4	18 41 8.0	2 21.2	49.20	51.95	.....	287 57 17.58	+ 0.19	- 3.19	-2 48.21	+68 59 35.76
		W	...	18 45 46.0	2 16.8	50.30	53.25	.....	72 1 48.52	+ 1.44	+ 2.99	+2 48.24	
19	δ Ursæ Minoris s. p.	E	4	6 0 45.0	2 17.5	50.55	51.55	.....	305 33 27.38	+ 1.07	- 0.58	-1 18.61	+86 37 17.80
		W	...	6 5 24.0	2 21.5	50.95	51.95	.....	54 25 39.30	+ 1.48	+ 0.61	+1 18.61	
20	φ Draconis s. p.	W	4	6 18 56.0	3 15.2	50.00	51.10	.....	69 43 59.00	+ 0.58	+ 5.53	+2 31.38	+71 17 41.44
		E	...	6 23 16.0	1 4.8	50.25	51.40	.....	290 15 4.22	+ 0.82	- 0.61	-2 31.40	

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>	<i>°</i>	<i>°</i>	<i>mm</i>						<i>° ' "</i>	<i>"</i>
20 20 44	72.8		29.721	6. Instrument in meridian, observation at IX with movable thread.				1	ASD 59.15.08	-32.62
20 25 51	72.0			4. Instrument in meridian, observation at II with movable thread.				2	35.16	-20.55
20 31 12	72.4	71.8		15. Instrument in meridian, observation at I with movable thread.				3	34.96	-11.67
21 42	72.1							4	36.10	-10.19
21 51	72.0							5	35.86	-30.93
22 1	71.8							6	35.21	-28.38
22 17	71.8	71.6	29.722					7	35.12	-10.08
22 38	71.4	71.0	29.721					8	36.18	
22 54	71.0							9	35.60	
23 12	71.2							10	35.82	
23 44	72.8							11	36.14	
23 56	72.0	71.7	29.724					12	36.11	+25.58
24 16	69.8							13	36.33	
24 26	69.1	71.8	29.725					14	35.16	
24 51	69.1	71.6	29.723					15	32.26	-29.88
25 10	68.8							16	34.59	
25 27	69.1							17	34.76	-30.23
25 46	69.0							18	33.78	+25.63
26 44	66.8	66.9	29.726					19	34.61	
6 4	66.0	67.2	29.725					20	44.70	10.22
6 22	65.9									

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	43 Camelop.	W	4	6 40 46.0	2 43.2	50.15	51.20	.....	30 3 29.45	+ 0.69	- 8.09	+ 32.61	+68 59 35.81
	October 2, L.	E	...	6 45 21.0	1 51.8	49.70	50.90	.....	329 55 45.18	+ 0.31	+ 3.80	- 32.60	
2	γ Draconis s. P.	E	3	6 18 52.0	3 58.4	49.65	50.80	.....	291 39 20.48	+ 0.66	- 7.71	- 2 23.09	+72 41 59.07
		W	...	6 23 16.0	0 25.6	51.55	52.95	.....	68 19 52.48	+ 2.75	+ 0.09	+ 2 23.21	
3	23 H. Camelop.	W	3	6 28 22.0	1 40.3	51.40	52.70	.....	40 43 9.40	+ 2.51	- 1.17	+ 49.33	+79 39 41.35
		E	...	6 32 10.0	2 7.7	49.40	50.50	.....	319 15 58.08	+ 0.41	+ 1.90	- 49.30	
4	43 Camelop.	E	2.5	6 40 27.0	3 2.4	50.05	51.35	.....	329 55 39.28	+ 1.16	+10.10	- 33.26	+68 59 35.57
		W	...	6 45 47.0	2 17.6	50.20	51.05	.....	30 3 25.90	+ 1.38	- 5.75	+ 33.23	
5	51 H. Cephei	W	2.5	6 53 20.0	2 41.6	49.95	51.35	.....	48 14 43.75	+ 1.07	- 0.73	+ 1 4.19	+87 11 29.67
	October 3, L.	E	3	6 58 6.0	2 4.4	50.85	52.10	.....	311 44 24.45	+ 1.89	+ 0.43	- 1 4.17	
6	δ Ursæ Minoris	E	3	18 0 46.0	2 15.9	54.75	52.25	.....	312 18 36.05	+ 0.29	+ 0.62	- 1 2.09	+86 37 15.86
		W	...	18 5 40.0	2 38.1	55.60	53.25	.....	47 40 30.45	+ 1.23	- 0.85	+ 1 2.13	
7	φ Draconis	W	3	18 19 32.0	2 39.2	48.15	48.40	.....	32 21 30.98	+ 1.36	- 6.44	+ 35.97	+71 17 42.98
		E	...	18 23 22.0	1 10.8	47.70	47.85	.....	327 37 43.40	+ 0.86	+ 1.27	- 35.99	
8	23 H. Camelop. s. P.	W	3	18 29 4.0	0 58.4	48.35	48.80	.....	61 22 51.30	+ 1.62	+ 0.30	+ 1 43.79	+79 39 41.86
		E	...	18 32 52.0	2 49.6	47.30	47.75	.....	298 36 20.20	+ 0.53	- 2.49	- 1 43.86	
9	24 H. Camelop. s. P.	E	3	18 43 26.0	2 47.7	47.45	48.00	.....	296 2 25.85	+ 0.73	- 2.96	- 1 56.25	+77 5 34.87
		W	...	18 48 10.0	1 56.3	49.00	49.50	.....	63 56 43.88	+ 2.31	+ 1.43	+ 1 56.37	
10	51 H. Cephei s. P.	W	2	18 52 50.0	3 11.9	48.80	48.95	.....	53 51 25.78	+ 1.96	+ 0.95	+ 1 18.11	+87 11 32.40
		E	3	18 58 4.0	2 2.1	48.25	48.45	.....	306 7 42.32	+ 1.44	- 0.38	- 1 18.14	
11	κ Delphini	E	2.5	20 31 27.0	3 7.5	48.80	48.90	.....	29 9 28.58	+ 1.95	-30.16	+ 32.03	+ 9 45 19.08
		W	...	20 35 51.0	1 16.5	49.50	49.15	.....	330 50 1.45	+ 2.46	+ 5.02	- 32.02	
12	λ Cygni	W	2.5	20 44 .....	.....	48.85	48.95	27.599	357 11 15.65	+ 1.26	- 0.24	- 2.78	+36 8 46.64
		E	...	.....	.....	48.75	48.80	27.599	2 44 10.08	+ 1.17	+ 0.24	+ 2.78	
13	f ² Cygni	E	3	21 3 .....	.....	49.05	49.05	26.429	351 37 36.52	+ 2.88	+ 0.36	- 8.44	+47 16 16.28
		W	2.5	.....	.....	49.30	49.05	26.429	8 19 19.15	+ 3.00	- 0.36	+ 8.44	
14	v Cygni	W	2.5	21 14 .....	.....	48.65	48.75	26.739	355 33 15.25	+ 1.05	- 0.23	- 4.45	+34 30 8.41
		E	...	.....	.....	48.70	48.55	26.739	4 23 22.78	+ 0.98	+ 0.23	+ 4.45	
15	b Capricorni	E	3.5	21 20 42.0	2 39.9	49.40	49.20	.....	61 6 30.58	+ 2.36	-11.47	+ 1 43.96	-22 13 13.19
		W	...	21 25 26.0	2 4.1	49.45	48.90	.....	298 52 40.25	+ 2.24	+ 6.91	- 1 43.99	
16	13 H. Cephei	W	3	21 33 25.5	2 41.0	48.35	48.45	.....	18 8 4.78	+ 1.51	-19.20	+ 18.87	+57 3 47.66
		E	...	21 38 19.0	2 12.5	48.60	48.85	.....	341 51 8.35	+ 1.80	+13.01	- 18.87	
17	μ Capricorni	E	3.5	21 45 28.0	2 42.7	49.35	49.35	.....	52 53 40.15	+ 2.47	-13.66	+ 1 16.03	-13 59 52.78
		W	...	21 50 32.0	2 21.3	49.25	48.65	.....	307 5 29.50	+ 2.05	+10.30	- 1 16.05	
18	o Aquarii	W	3	21 55 48.5	2 39.4	48.35	48.25	.....	318 28 7.25	+ 1.41	+16.24	- 50.99	- 2 36 44.84
		E	...	22 0 27.0	1 59.1	48.65	48.70	.....	41 30 53.55	+ 1.74	- 9.07	+ 51.00	
19	λ Piscis Australis	E	3	22 6 26.0	2 33.4	49.25	49.35	.....	67 7 0.48	+ 2.37	- 9.55	+ 2 15.81	-28 14 16.72
		W	...	22 11 15.0	2 15.6	49.20	48.55	.....	292 52 8.40	+ 2.01	+ 7.40	- 2 15.85	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>' "</i>
1 6 31	56.1	...	...	12, 13. Instrument in meridian, observation at IX with movable thread.				1	359 59 35.08	- 25.05
6 44	55.9	57.7	29.440	13. Instrument in meridian, observation at I with movable thread.				2	34.44	...
2 6 18	51.9	58.9	29.606					3	35.55	...
6 40	49.9	...	...					4	36.02	+ 25.07
6 49	50.7	...	...					5	35.44	...
7 0	51.2	53.7	29.668					6	33.92	...
3 18 1	60.2	62.7	29.834					7	35.70	- 30.16
18 22	58.6	...	...					8	35.70	...
18 32	58.1	...	...					9	35.08	+ 27.07
18 46	55.6	...	...					10	36.02	...
18 50	55.5	59.8	29.851					11	34.66	- 25.81
20 35	54.1	...	...					12	35.93	...
20 48	54.2	56.7	29.892					13	34.84	- 32.43
21 2	53.7	...	...					14	36.76	+ 10.84
21 24	52.9	55.8	29.906					15	35.42	- 17.74
21 32	53.1	...	...					16	35.12	- 34.88
21 54	52.6	...	...					17	35.40	...
21 59	52.6	...	...					18	35.60	- 24.34
22 9	52.3	55.1	29.916					19	35.56	- 17.40

				Notes.			
				1. Very unsteady.			
				5, 8. Very faint.			
				10 E. One level reading increased 1 div.			

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	October 4, L. Draconis	E W	2.5 ...	18 20 25.0 18 25 20.0	2 25.3 2 29.7	49.30 50.20	48.70 49.70	...	326 13 26.25 33 45 42.65	+ 0.93 + 1.91	+ 4.79 - 5.09	+ 38.05 + 38.08	+72 41 58.64
2	153 H ¹ . Draconis	W E	2.5 ...	18 33 57.0 18 38 9.0	2 2.2 2 9.8	50.00 49.10	49.10 48.10	...	26 28 34.42 333 30 33.52	+ 1.44 + 0.47	- 5.91 + 6.67	+ 28.42 + 28.44	+65 24 39.90
3	24 H. Camelop. s. P.	W E	3 ...	18 43 44.0 18 48 58.0	2 29.8 2 44.2	49.85 48.80	49.20 48.15	...	63 56 42.68 296 2 25.98	+ 1.42 + 0.33	+ 2.37 - 2.84	+ 56.36 + 56.43	+77 5 35.28
4	2 Draconis	E W	3 ...	18 53 7.0 18 57 58.0	2 31.5 2 19.5	48.65 49.75	48.10 49.35	...	327 44 41.95 32 14 26.48	+ 0.25 + 1.42	+ 5.89 - 4.99	+ 36.07 + 36.08	+71 10 40.30
5	7 Draconis s. P.	W E	3 4	6 20 8.0 6 25 24.0	2 42.2 2 33.8	50.10 49.05	50.70 48.00	...	68 19 49.10 291 39 19.20	+ 1.24 + 0.15	+ 3.57 - 3.21	+ 25.33 + 25.33	+72 41 58.96
6	24 H. Camelop.	W E	3 ...	6 43 37.0 6 48 43.0	2 36.9 2 29.1	50.35 49.10	49.20 47.95	...	38 9 8.60 321 49 59.15	+ 1.41 + 0.19	+ 3.78 - 3.41	+ 45.65 + 45.65	+77 5 34.21
7	51 H. Cephei	E W	3 3.5	6 53 52.0 6 59 18.0	2 10.8 3 15.2	49.20 50.50	47.95 49.30	...	311 44 26.68 48 14 44.05	+ 0.15 + 1.52	+ 0.48 + 1.06	+ 5.04 + 5.06	+87 11 30.47
8	October 5, L. Draconis	W E	2 ...	18 20 27.0 18 25 5.0	2 23.2 2 14.8	49.45 48.60	50.50 49.30	...	33 45 43.52 32 13 26.52	+ 1.18 + 0.11	- 4.65 + 4.12	+ 37.20 + 37.21	+72 41 58.68
9	153 H ¹ . Draconis	E W	3 ...	18 32 47.0 18 37 1.0	3 12.1 3 1.9	48.70 49.85	49.65 50.95	...	333 30 24.90 26 28 29.78	+ 0.27 + 1.53	+ 14.61 - 1.52	- 27.76 + 27.76	+65 24 39.58
10	50 Draconis	E W	2.5 ...	18 46 49.0 18 51 14.0	2 42.5 1 42.5	48.80 50.00	49.25 51.15	...	323 35 41.70 36 23 25.35	+ 0.21 + 1.77	+ 4.78 - 1.90	+ 41.13 + 41.15	+75 19 47.22
11	2 Draconis	W E	3 ...	18 54 42.0 18 58 42.0	0 56.5 3 3.5	50.00 49.30	51.15 49.70	...	32 14 22.92 327 44 37.78	+ 1.70 + 0.64	- 0.82 + 8.64	+ 35.21 + 35.23	+71 10 40.41
12	October 6, L. Camelop. s. P.	W E	3.5 ...	18 40 31.0 18 50 16.0	2 58.8 6 46.2	50.35 49.85	50.20 49.80	...	72 1 37.90 287 57 50.05	+ 2.02 + 1.56	+ 5.11 - 26.37	+ 56.21 + 56.25	+68 59 37.36
13	51 H ¹ . Cephei s. P.	E W	2 ...	18 53 28.0 18 57 14.0	2 35.6 1 10.4	49.85 51.05	50.00 51.15	...	306 7 43.18 53 51 24.92	+ 1.66 + 2.85	- 0.62 + 0.13	+ 19.00 + 19.00	+87 11 32.34
14	0 Lyrae	W E	2 ...	19 13 ...	...	50.35 49.60	50.30 49.95	27.936 27.936	359 0 30.42 0 54 30.35	+ 1.27 + 0.70	- 0.26 + 0.26	+ 0.96 + 0.96	+37 58 15.92
15	2 Sagittae	E W	3.5 2.5	19 30 20.5 19 35 16.7	2 42.3 2 13.9	50.35 51.15	50.35 50.75	...	22 39 38.40 337 19 35.00	+ 2.10 + 2.71	- 27.84 + 18.95	+ 24.22 + 24.23	+16 15 14.60
16	7 Aquilae	W E	3.5 3	19 45 4.0 19 49 51.0	2 37.3 2 9.7	49.95 49.60	49.85 49.80	...	321 50 42.68 38 8 23.18	+ 1.58 + 1.34	+ 17.00 - 11.56	+ 45.55 + 45.56	+ 0 45 55.42
17	15 Vulpeculae	E W	3 ...	19 54 32.5 19 59 30.3	2 42.5 2 15.3	49.80 50.80	49.85 50.45	...	11 25 42.05 348 33 39.25	+ 1.57 + 2.38	- 50.14 + 34.78	+ 11.75 + 11.76	+27 29 40.08
18	4 Capricorni	W E	3.5 ...	20 9 45.0 20 14 56.0	2 44.7 2 20.3	49.50 49.35	49.50 49.30	...	208 59 42.25 60 59 25.28	+ 1.23 + 1.03	+ 12.19 - 9.62	+ 44.47 + 44.49	-22 6 8.17
19	2 Delphini	W E	2.5 ...	20 31 36.5 20 36 34.5	2 58.0 2 0.0	50.60 49.85	50.10 49.55	...	330 49 41.28 29 9 13.35	+ 2.10 + 1.41	+ 27.19 - 12.36	+ 32.48 + 32.48	+ 9 45 18.42
20	2 Cygni	E W	2 ...	20 44 ...	...	50.15 51.15	49.75 50.40	25.992 25.992	2 45 14.02 357 12 20.72	+ 2.40 + 3.18	+ 0.21 - 0.24	+ 2.82 + 2.82	+36 8 47.50

Time	Ther- m.	Alt ther	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red to 1904 0
<i>h m s</i>	<i>"</i>	<i>"</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
1 13 21	50.1	61.4	30.094	14 Instrument in meridian, observation at IX with movable thread.	1	359 59 35.74	...
1 17 31	50.9	...	...	20 Instrument in meridian, observation at I with movable thread.	2	35 10	-40.99
1 18 47	50.1	...	...		3	34.94	+27.66
1 20 26	50.5	59.8	30.097		4	35.50	-31.95
1 21 11	49.7	51.7	29.991		5	35.02	...
1 24 27	49.7	...	...		6	34.49	+27.65
1 27 1	49.6	51.7	29.983		7	35.92	...
1 28 11	50.4	59.8	29.987		8	35.40	...
1 30 0	50.5	...	...		9	34.78	30.93
1 31 55	50.5	...	...		10	35.06	...
1 32 2	50.1	60.4	29.976		11	35.42	-31.93
1 33 43	50.3	...	...		12	35.42	+25.64
1 35 08	53.2	55.4	30.041		13	36.06	...
1 36 11	50.3	...	...		14	36.98	...
1 36 33	50.1	...	...		15	34.66	-25.06
1 37 40	50.8	...	30.012		16	37.12	-21.86
1 38 47	50.9	...	...		17	35.19	-29.47
1 39 13	50.9	...	...		18	36.19	-15.19
1 40 00	50.9	...	...		19	36.48	-25.86
1 40 48	49.9	57.1	29.975		20	36.19	...

Note
W, 9° Very faint.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	7 Microscopii	W	4	20 52 54.0	2 37.3	49.85	49.50	.....	288 29 14.48	+ 1.38	+ 9.32	-2 52.50	-32 37 46.16
		E	...	20 57 50.0	2 18.7	49.50	49.45	.....	71 29 52.12	+ 1.22	- 7.25	+2 52.54	
2	3 Piscis Australis	E	4	21 5 3.0	2 39.8	50.15	49.65	.....	66 53 10.42	+ 1.61	-10.40	+2 15.90	-28 0 24.99
		W	...	21 9 59.0	2 16.2	51.05	50.25	.....	293 5 59.90	+ 2.43	+ 7.56	-2 15.98	
3	69 Cygni	W	2.5	21 22 ....	.....	50.05	49.70	27.053	357 18 32.12	+ 0.81	- 0.24	- 2.72	+36 15 40.12
		E	...	.....	.....	48.85	48.85	27.053	2 37 40.58	- 0.17	+ 0.24	+ 2.72	
4	74 Cygni	E	3	21 33 ....	.....	49.60	49.15	24.968	358 55 21.55	+ 1.81	+ 0.28	- 1.09	+39 59 25.74
		W	...	.....	.....	50.15	49.40	24.968	1 3 37.35	+ 2.24	- 0.28	+ 1.09	
5	μ Capricorni	W	3.5	21 45 31.0	2 39.7	49.10	48.75	.....	307 5 31.18	+ 0.63	+13.16	-1 17.34	-13 59 52.52
		E	3	21 50 24.0	2 13.3	48.70	48.75	.....	52 53 37.70	+ 0.43	- 9.17	+1 17.36	
6	o Aquarii	E	3.5	21 55 52.0	2 35.9	49.40	49.15	.....	41 31 0.70	+ 0.96	-15.54	+ 51.86	- 2 36 45.41
		W	2.5	22 0 25.0	1 57.1	50.50	50.10	.....	318 28 14.55	+ 2.08	+ 8.77	- 51.88	
7	λ Piscis Australis	W	4	22 6 26.0	2 33.4	49.50	49.10	.....	292 52 8.60	+ 1.05	+ 9.55	-2 18.14	-28 14 16.88
		E	3.5	22 11 15.0	2 15.6	48.80	48.50	.....	67 6 57.42	+ 0.32	- 7.46	+2 18.19	
8	October 7, L. Z Draconis	E	2	18 20 12.0	2 38.2	50.00	49.80	.....	326 13 28.05	+ 1.14	+ 5.68	- 39.14	+72 41 57.94
		W	...	18 25 31.0	2 40.8	50.30	50.20	.....	33 45 43.15	+ 1.51	- 5.87	+ 39.17	
9	43 Camelop. S. P.	E	3	18 43 2.0	0 27.9	49.95	49.70	.....	287 57 28.15	+ 1.07	- 0.12	-2 59.47	+68 59 37.30
		W	...	18 47 17.0	3 47.1	50.15	50.00	.....	72 1 32.25	+ 1.32	+ 8.24	+2 59.58	
10	51 H. Cephei S. P.	W	2	18 52 44.0	3 20.2	50.45	50.05	.....	53 51 24.22	+ 1.49	+ 1.03	+1 20.52	+87 11 31.72
		E	...	18 58 40.0	2 35.8	49.70	49.25	.....	306 7 44.85	+ 0.72	- 0.63	-1 20.59	
11	159 B. Lyrae	E	2	19 16 ....	.....	49.75	49.55	26.504	358 42 15.08	+ 1.39	+ 0.18	- 1.31	+40 11 30.71
		W	...	.....	.....	50.20	50.20	26.504	1 14 39.95	+ 2.28	- 0.42	+ 1.31	
12	ε Sagittae	W	2	19 30 19.7	2 43.1	49.40	49.15	.....	337 19 29.40	+ 0.50	+28.11	- 24.68	+16 15 15.14
		E	...	19 35 22.5	2 19.7	49.50	48.90	.....	22 39 32.20	+ 0.43	-20.63	+ 24.69	
13	23 H. Camelop.	E	3.5	6 27 40.0	2 19.0	51.10	49.45	.....	319 15 58.85	+ 0.71	+ 2.25	- 51.11	+79 39 40.48
		W	...	6 33 2.0	3 3.0	51.90	50.05	.....	40 43 9.45	+ 1.38	- 3.91	+ 51.10	
14	24 H. Camelop.	E	3	6 43 10.0	2 51.1	51.20	49.65	.....	321 49 59.65	+ 0.87	+ 4.49	- 46.62	+77 5 33.72
		W	...	6 48 8.0	1 57.9	51.50	49.95	.....	38 9 6.58	+ 1.12	- 2.13	+ 46.62	
15	51 H. Cephei	W	2.5	6 54 8.0	1 52.2	51.25	49.85	.....	48 14 43.60	+ 0.91	- 0.35	+1 6.45	+87 11 31.34
		E	...	6 58 14.0	2 13.8	50.80	49.10	.....	311 44 27.22	+ 0.29	+ 0.50	-1 6.45	
16	October 8, L. 50 Draconis	W	2	18 46 19.0	3 12.4	48.70	49.00	.....	36 23 30.32	+ 0.89	- 6.70	+ 41.99	+75 19 46.76
		E	...	18 50 10.0	0 38.6	49.45	49.55	.....	323 35 46.78	+ 1.57	+ 0.27	- 41.99	
17	υ Draconis	E	3	18 54 23.0	1 15.5	49.45	49.55	.....	327 44 46.58	+ 1.51	+ 1.46	- 35.94	+71 10 39.94
		W	2	18 58 30.0	2 51.5	48.95	49.10	.....	32 14 30.42	+ 1.01	- 7.54	+ 35.96	
18	55 Draconis	W	2.5	19 7 3.0	2 26.0	48.20	48.55	.....	26 53 35.82	+ 0.40	- 8.18	+ 28.95	+65 49 37.43
		E	...	19 11 10.0	1 41.0	49.10	49.10	.....	333 5 39.65	+ 1.15	+ 3.92	- 28.95	
19	October 9, L. φ Draconis S. P.	E	4	6 19 31.0	2 40.0	48.75	49.20	.....	290 15 11.88	+ 1.19	- 3.72	-2 32.04	+71 17 43.81
		W	...	6 24 44.0	2 33.0	49.30	50.15	.....	69 43 58.58	+ 1.99	+ 3.40	+2 32.08	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
6 20 56	49.9	.....	.....	3. Instrument in meridian, observation at IX with movable thread.	1	359 59 35.66	.....
21 8	49.3	.....	.....	4. Instrument in meridian, observation at I with movable thread.	2	35.72	-15.18
21 20	48.9	.....	.....	11. Instrument in meridian; E. observation at II; W. observation at I + 5°. with movable thread.	3	30.23	-31.24
21 31	48.3	50.7	30.098		4	35.88	.....
21 48	47.6	.....	.....		5	36.98	.....
21 59	47.6	.....	.....		6	35.75	-23.25
22 9	47.2	49.6	30.109		7	34.70	-16.87
7 18 23	49.9	52.3	30.244		8	36.84	.....
18 48	47.6	.....	.....		9	35.51	+25.63
18 56	46.7	.....	.....		10	35.80	.....
19 5	.....	50.3	30.238		11	30.37	-30.61
19 20	46.1	.....	.....		12	35.01	-25.95
19 34	45.6	49.6	30.240		13	34.36	.....
6 31	42.7	44.4	30.198		14	35.29	+27.62
6 47	42.9	.....	.....		15	36.08	.....
6 59	42.7	44.4	30.194		16	36.56	.....
8 18 46	61.2	63.0	30.098		17	36.73	-11.91
18 57	61.0	.....	.....		18	36.38	-32.61
19 10	60.2	62.1	30.091		19	36.68	-29.81
9 6 23	60.6	61.8	29.860				

Note.
13. Very faint; clouds.

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	50 Draconis S. P.	W E	2.5 ...	6 48 58.0 6 53 11.0	0 33.4 3 39.6	48.00 47.50	48.55 48.35	.....	65 42 27.35 294 16 51.15	+ 0.43 + 0.09	+ 0.13 - 5.69	+2 4.91 -2 4.91	+75 19 47.09
2	u Draconis S. P.	E W	3 ...	6 57 14.0 7 0 27.0	1 35.6 4 48.6	47.70 48.30	48.45 49.15	.....	290 8 7.58 69 50 52.50	+ 0.31 + 0.91	- 1.33 +12.13	-2 33.25 +2 33.25	+71 10 40.44
3	25 H. Camelop.	W E	2.5 2	7 8 33.0 7 13 32.0	2 33.9 2 25.1	47.95 47.60	48.80 48.35	.....	43 38 47.72 310 20 25.10	+ 0.55 + 0.12	- 1.88 + 1.67	+ 54.05 - 54.06	+82 35 20.62
4	October 10, L. φ Draconis	E W	3 2.5	18 21 44.0 18 26 54.0	0 27.0 4 43.0	46.25 48.10	50.10 51.60	.....	327 37 45.15 32 21 46.38	+ 0.47 + 2.19	+ 0.18 -20.35	- 34.36 + 34.40	+71 17 42.41
5	110 Herculis	W E	3 ...	18 38 56.0 18 43 53.5	2 41.6 2 15.9	46.20 47.30	50.10 50.90	.....	341 31 45.70 18 27 10.25	+ 0.44 + 1.39	+32.78 -23.19	- 18.17 + 18.18	+20 27 40.88
6	51 H. Cephei S. P.	E W	2.5 3.5	18 52 54.0 18 57 26.0	3 11.8 1 20.2	47.50 47.40	50.00 51.00	.....	306 7 39.22 53 51 31.75	+ 1.51 + 1.51	- 0.95 + 0.17	-1 14.52 +1 14.58	+87 11 31.80
7	25 H. Camelop. S. P.	W E	3 4	19 8 44.0 19 13 52.0	2 23.0 2 45.0	46.00 47.30	49.60 50.65	.....	58 27 27.00 301 31 45.15	+ 0.07 + 1.30	+ 1.31 - 1.75	+1 28.73 -1 28.77	+82 35 22.59
8	October 11, L. κ Cygni	E W	2.5 ...	19 12 16.5 19 17 22.5	2 37.7 2 28.3	48.00 48.00	51.30 51.20	.....	345 42 40.45 14 16 27.28	+ 3.20 + 3.23	+25.63 -22.66	- 13.97 + 13.97	+53 12 0.02
9	h Sagittarii	W E	3 ...	19 28 19.0 19 33 10.0	2 35.4 2 15.6	47.30 48.35	50.50 51.65	.....	296 0 29.18 63 58 39.20	+ 2.51 + 3.65	+10.32 - 7.86	-1 51.92 +1 51.95	-25 5 31.61
10	η Aquilæ	E W	3 ...	19 45 2.0 19 49 47.0	2 35.2 2 9.8	49.75 48.50	52.55 51.40	.....	38 8 28.22 321 50 45.25	+ 4.81 + 3.60	-16.55 +11.57	+ 43.16 - 43.17	+ 0 45 55.61
11	15 Vulpeculæ	W E	3 ...	19 54 29.0 19 59 27.0	2 41.9 2 16.1	47.35 48.85	50.50 51.65	.....	348 33 27.08 11 25 29.55	+ 2.59 + 3.95	+49.79 -35.19	- 11.13 + 11.13	+27 29 46.71
12	176 B. Cygni	E W	2.5 ...	20 17 ..... .....	..... .....	49.40 48.80	52.25 51.75	26.088 26.088	359 47 26.52 0 10 0.20	+ 5.27 + 4.73	+ 0.27 - 0.27	- 0.18 + 0.18	+39 6 33.29
13	42 Cygni	W E	3.5 ...	20 26 ..... .....	..... .....	48.10 48.45	50.95 51.85	27.154 27.154	357 11 24.18 2 44 42.80	+ 2.48 + 3.07	- 0.24 + 0.24	- 2.67 + 2.67	+36 8 34.29
14	♄ Capricorni	E W	3.5 ...	20 37 58.0 20 42 37.0	2 29.5 2 9.5	49.15 48.40	51.95 51.35	.....	64 29 47.95 295 29 23.72	+ 4.28 + 3.56	- 9.47 + 7.11	+1 54.99 -1 55.01	-25 36 42.37
15	γ Microscopii	E W	3.5 ...	20 52 58.0 20 57 50.0	2 29.2 2 28.8	48.50 47.85	51.35 50.40	.....	71 30 2.88 288 29 7.78	+ 3.65 + 2.78	- 8.39 + 8.34	+2 43.26 -2 43.31	-32 37 46.09
16	3 Piscis Australis	W E	3 ...	21 5 9.0 21 10 6.0	2 29.7 2 27.3	46.90 48.15	49.80 51.10	.....	293 5 54.88 66 53 17.05	+ 2.03 + 3.29	+ 9.13 - 8.83	-2 8.59 +2 8.61	-28 0 24.53
17	ε Aquarii	W E	3 ...	21 59 21.0 22 3 18.0	1 57.1 1 59.9	44.30 47.00	47.15 49.90	.....	306 45 43.08 53 13 35.05	- 0.67 + 2.11	+ 7.04 - 7.38	-1 13.79 +1 13.79	-14 19 47.15
18	θ Aquarii	E W	2.5 ...	22 9 15.0 22 14 40.0	2 34.1 2 56.9	47.50 45.95	50.45 48.85	.....	47 9 24.42 312 49 43.15	+ 2.63 + 1.05	-13.60 +17.92	+ 59.48 - 59.50	- 8 15 18.35
19	7 Lacertæ	W E	2.5 4	22 24 43.0 22 30 13.0	2 40.9 2 49.1	44.85 47.20	47.90 50.10	.....	10 52 38.82 349 6 31.70	- 0.07 + 2.26	-37.56 +41.49	+ 10.62 - 10.62	+49 47 50.30

Time.	Ther. 38°.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
d h m	s		in.			<i>° ' "</i>	<i>"</i>
9 6 12	59.9	...	...	12 Instrument in meridian, observation at I with movable thread.	1	359 59 36.73	...
7 1	59.7	...	...	13 Instrument in meridian, observation at IX with movable thread.	2	36.05	-31.94
7 17	59.6	61.2	29.860		3	36.64	...
10 18 25	59.6	80.1	29.728		4	37.23	-29.80
18 47	77.5	...	...		5	36.69	...
18 56	76.7	...	...		6	36.64	...
12 11	75.9	77.7	29.714		7	36.52	...
11 19 16	72.8	74.9	29.659		8	38.61	...
12 11	72.5	...	...		9	38.52	...
12 49	71.7	...	...		10	38.44	-21.81
19 57	71.5	73.0	29.662		11	39.34	-29.66
20 15	71.1	...	...		12	38.50	-12.15
20 24	70.6	...	...	Notes.	13	39.94	-31.96
20 41	70.4	...	...	2.19 Very faint, thick clouds.	14	38.56	...
20 56	69.6	72.5	29.661	18 W. Disturbed by clouds.	15	38.50	...
21 8	69.5	...	...		16	38.78	-14.73
22 2	69.5	...	...		17	39.62	...
22 18	69.5	71.1	29.664		18	37.78	...
22 25	69.6	...	...		19	38.12	...

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	October 13, L. 110 Hercules	E W	2.5 ...	18 40 27.0 18 44 25.0	1 6.5 2 51.5	49.50 48.35	50.75 49.75	..... .....	18 26 56.75 341 31 41.65	+ 2.03 + 0.97	- 5.55 + 36.92	+ 19.36 - 19.38	+20 27 40.59
2	51 H. Cephei s. p.	W E	2 ...	18 52 36.0 18 58 12.0	3 27.4 2 8.6	47.75 49.35	49.20 50.70	..... .....	53 51 28.42 306 7 44.42	+ 0.37 + 1.97	+ 1.11 - 0.43	+ 19.40 - 19.45	+87 11 31.79
3	55 Draconis	E W	2 ...	19 6 56.0 19 11 46.0	2 28.9 2 21.1	49.40 48.50	51.05 50.10	..... .....	333 5 37.30 26 53 35.30	+ 2.17 + 1.22	+ 8.51 - 7.64	+ 29.52 + 29.53	+65 49 36.79
4	λ Ursæ Minoris	W E	2 ...	19 16 33.0 19 21 38.0	0 44.0 4 21.0	48.45 49.90	49.70 51.10	..... .....	50 3 24.20 309 55 47.45	+ 0.98 + 2.46	- 0.02 + 0.66	+ 9.52 - 9.57	+89 0 13.65
5	h Sagittarii	E W	3 ...	19 28 21.0 19 33 24.0	2 33.6 2 29.4	50.85 48.75	52.20 50.35	..... .....	63 58 32.88 296 0 39.35	+ 3.44 + 1.72	- 10.09 + 9.54	+ 59.05 - 59.13	-25 5 30.24
6	October 14, L. β Lyrae	E W	3 ...	18 47 ..... .....	..... .....	48.75 49.95	50.90 51.90	26.299 26.299	5 38 15.40 354 18 55.12	+ 1.74 + 2.89	+ 0.22 - 0.22	+ 5.67 - 5.67	+33 15 31.37
7	ν Draconis	W E	2.5 ...	18 53 1.0 18 57 55.0	2 33.1 2 20.9	49.40 48.00	51.50 50.15	..... .....	32 14 28.80 327 44 44.68	+ 1.64 + 0.25	- 6.01 + 5.09	+ 36.12 - 36.13	+71 10 40.14
8	25 H. Camelop. s. p.	E W	4 ...	19 7 14.0 19 11 52.0	3 49.8 0 48.2	48.40 49.80	50.60 51.85	..... .....	301 31 51.62 58 27 21.85	+ 0.75 + 2.07	- 3.39 + 0.15	- 33.16 + 33.18	+82 35 22.47
9	λ Ursæ Minoris	W E	3 ...	19 16 42.0 19 21 20.0	0 33.4 4 4.6	49.50 48.20	51.45 50.35	..... .....	50 3 25.10 309 55 46.70	+ 1.72 + 0.51	- 0.01 + 0.58	+ 8.42 - 8.44	+89 0 14.75
10	19 Capricorni	W E	3 ...	20 47 8.0 20 52 1.0	2 17.3 2 35.7	49.00 49.20	50.90 51.05	..... .....	302 48 42.55 57 10 29.50	+ 1.14 + 1.31	+ 9.04 - 11.62	- 29.35 + 29.41	-18 16 55.80
11	A Capricorni	E W	3 ...	20 58 56.0 21 3 43.0	2 37.8 2 9.2	49.75 50.05	51.55 51.50	..... .....	64 16 9.42 295 43 3.35	+ 1.82 + 2.02	- 10.59 + 7.10	+ 59.52 - 59.58	-25 23 6.83
12	α Equulei	W E	3.5 2.5	21 8 29.0 21 13 24.5	2 35.3 2 20.2	49.15 49.00	50.80 51.00	..... .....	325 56 8.10 34 3 1.65	+ 1.26 + 1.21	+ 18.21 - 14.84	- 39.12 + 39.13	+ 4 51 27.46
13	69 Cygni	E W	2 ...	21 22 ..... .....	..... .....	49.50 50.20	51.30 51.60	26.012 26.012	2 38 18.78 357 19 13.25	+ 2.31 + 2.89	+ 0.24 - 0.24	+ 2.69 - 2.69	+36 15 41.41
14	74 Cygni	W E	2.5 ...	21 33 ..... .....	..... .....	49.30 48.70	50.90 50.55	28.660 28.660	1 1 12.28 358 52 51.95	+ 0.60 + 0.09	- 0.28 + 0.28	+ 1.08 - 1.08	+39 59 28.03
15	14 Pegasi	E W	2.5 ...	21 46 ..... .....	..... .....	49.30 50.15	51.05 51.50	25.093 25.093	9 10 23.78 350 48 23.85	+ 2.06 + 2.75	+ 0.19 - 0.19	+ 9.39 - 9.39	+29 44 7.61
16	28 Aquarii	W E	3.5 ...	21 53 26.0 21 58 25.0	2 47.4 2 11.6	49.00 48.85	50.40 50.75	..... .....	321 13 48.05 38 45 17.42	+ 0.96 + 1.02	+ 18.98 - 11.74	- 46.61 + 46.60	+ 0° 9 0.85
17	λ Cephei	E W	2.5 ...	22 6 7.0 22 10 36.0	2 12.2 2 16.8	49.65 50.15	51.25 51.40	..... .....	339 58 3.55 20 1 9.20	+ 1.74 + 2.02	+ 11.17 - 11.96	- 21.17 + 21.17	+58 56 59.38
18	3 Lacertæ	W E	2.5 ...	22 17 20.5 22 22 9.5	2 30.4 2 18.6	49.05 48.60	50.60 50.35	..... .....	12 49 55.70 347 9 18.75	+ 1.10 + 0.69	- 26.74 + 22.71	+ 13.25 - 13.26	+51 45 24.02
19	ν Aquarii	E W	3 ...	22 27 6.0 22 31 48.0	2 23.8 2 18.2	49.25 49.95	51.00 51.35	..... .....	60 5 2.58 299 54 8.50	+ 1.31 + 1.95	- 9.43 + 8.71	+ 40.74 - 40.70	-21 11 41.56
20	50 Draconis s. p.	E W	3.5 ...	6 46 57.0 6 51 53.0	2 29.9 2 26.1	49.50 49.55	50.20 50.25	..... .....	294 16 52.50 65 42 18.92	+ 0.08 + 0.10	- 2.65 + 2.52	- 10.07 + 10.10	+75 19 47.30

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
13 18 47	51.6	54.2	30.067	6, 13, 15. Instrument in meridian, observation at I with movable thread.						1	359 59 36.38	.....
18 56	51.0	.....	.....	14. Instrument in meridian, observation at IX with movable thread.						2	37.90	.....
19 10	50.3	.....	.....							3	38.44	34.79
19 19	49.5	.....	.....							4	37.84	.....
19 32	48.6	51.9	30.070							5	38.23	.....
14 18 45	57.6	59.8	29.998							6	36.32	.....
18 56	56.9	.....	.....							7	37.22	31.98
19 6	56.5	.....	.....							8	36.54	.....
19 20	56.3	58.6	30.003							9	37.29	.....
20 50	52.9	55.4	30.018							10	35.99	17.30
21 3	52.1	.....	.....							11	36.53	15.24
21 12	51.9	.....	.....							12	37.80	.....
21 26	51.6	.....	.....							13	35.66	32.26
21 49	50.8	53.5	30.020	Note.						14	37.64	.....
21 56	50.6	.....	.....	10 W. One microscope reading increased 10".						15	35.74	-30.76
22 9	50.6	.....	.....							16	37.34	21.93
22 21	49.9	.....	.....							17	37.86	-32.83
22 30	50.3	52.4	30.025							18	36.10	.....
6 47	42.8	44.6	30.012							19	36.83	-18.23
										20	35.75	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	υ Draconis s. p.	W	3.5	6 55 38.0	0 3.9	49.50	49.85	.....	69 50 59.12	- 0.09	+ 0.00	+2 39.63	+71 10 40.57
		E	...	6 59 24.0	3 49.9	49.70	50.45	.....	290 8 20.38	+ 0.39	- 7.71	-2 39.63	
2	55 Draconis s. p.	E	3	7 7 29.0	1 55.8	49.60	50.20	.....	284 48 11.38	+ 0.22	- 2.41	-3 39.90	+65 49 37.08
		W	...	7 11 49.0	2 24.2	50.20	50.85	.....	75 10 57.08	+ 0.78	+ 3.74	+3 39.91	
3	λ Ursæ Minoris s. p.	W	2.5	7 17 12.0	0 2.6	50.30	50.90	.....	52 2 47.48	+ 0.85	- 0.00	+1 15.61	+89 0 15.49
	October 15, L.	E	...	7 21 24.0	4 9.4	49.80	50.50	.....	307 56 24.40	+ 0.37	- 0.59	-1 15.63	
4	β Lyrae	W	3	18 47 .....	.....	50.10	52.55	26.946	354 18 30.48	+ 1.07	- 0.22	- 5.69	+33 15 31.67
		E	...	.....	.....	48.75	50.95	26.946	5 37 50.38	- 0.36	+ 0.22	+ 5.69	
5	υ Draconis	E	2	18 52 40.0	2 45.1	48.65	50.90	.....	327 44 42.32	+ 0.22	+ 6.09	- 36.21	+71 10 40.27
		W	...	18 58 8.0	2 33.9	50.35	52.70	.....	32 14 28.12	+ 2.00	- 6.08	+ 36.21	
6	25 H. Camelop. s. p.	W	2.5	19 7 6.0	3 58.1	50.35	52.40	.....	58 27 17.95	+ 1.90	+ 3.64	+1 33.29	+82 35 22.27
		E	...	19 11 10.0	0 5.9	48.75	50.85	.....	301 31 47.92	+ 0.32	- 0.00	-1 33.30	
7	λ Ursæ Minoris	E	2	19 15 22.0	1 52.0	48.65	50.85	.....	309 55 46.28	+ 0.27	+ 0.12	-1 8.53	+89 0 14.69
		W	...	19 19 36.0	2 22.0	50.15	52.35	.....	50 3 23.78	+ 1.78	- 0.20	+1 8.55	
8	225 B. Draconis	W	2.5	19 24 54.0	2 35.7	49.65	51.90	.....	40 28 43.52	+ 1.24	- 2.90	+ 49.03	+79 25 11.63
	October 16, L.	E	...	19 30 20.0	2 50.3	48.55	50.75	.....	319 30 26.75	+ 0.09	+ 3.48	- 49.06	
9	υ Draconis s. p.	E	3.5	6 51 34.0	4 0.1	50.20	50.55	.....	290 8 21.48	+ 0.87	- 8.39	-2 39.60	+71 10 40.91
		W	...	6 55 46.0	0 11.9	50.25	50.50	.....	69 50 58.30	+ 0.90	+ 0.02	+2 39.70	
10	55 Draconis s. p.	W	3	7 6 28.0	2 56.9	49.65	50.05	.....	75 10 54.98	+ 0.35	+ 5.62	+3 40.18	+65 49 37.97
		E	...	7 12 14.0	2 49.1	50.40	50.45	.....	284 48 15.10	+ 1.04	- 5.14	-3 40.30	
11	λ Ursæ Minoris s. p.	E	2	7 16 38.0	0 33.8	50.40	50.15	.....	307 56 23.68	+ 0.77	- 0.01	-1 15.75	+89 0 15.83
		W	...	7 21 12.0	4 0.2	50.25	50.55	.....	52 2 46.15	+ 0.92	+ 0.55	+1 15.79	
12	225 B. Draconis s. p.	W	2.5	7 25 18.0	2 11.6	50.30	50.15	.....	61 37 14.45	+ 0.78	+ 1.53	+1 49.22	+79 25 13.27
		E	...	7 31 16.0	3 46.4	50.25	50.10	.....	298 21 59.15	+ 0.76	- 4.53	-1 49.23	
13	υ Draconis s. p.	E	3	7 45 21.0	3 10.3	50.25	50.20	.....	288 59 47.88	+ 0.80	- 5.55	-2 50.32	+70 1 59.73
	October 17, L.	W	...	7 50 14.0	7 42.7	50.05	50.35	.....	70 58 55.82	+ 0.79	+32.81	+2 50.32	
14	λ Aquilæ	E	2	18 58 1.0	3 10.7	49.05	48.35	.....	43 55 39.00	+ 2.91	-22.15	+ 54.16	- 5 1 18.71
		W	...	19 3 2.5	1 50.8	48.90	48.35	.....	316 3 46.78	+ 2.84	+ 7.48	- 54.21	
15	δ Draconis	W	3	19 8 50.0	3 42.6	48.85	48.05	.....	28 34 10.60	+ 2.57	-16.82	+ 30.70	+67 30 6.21
		E	...	19 12 46.0	0 13.4	48.70	47.65	.....	331 25 16.55	+ 2.36	+ 0.06	- 30.71	
16	λ Ursæ Minoris	E	2	19 16 33.0	0 38.1	48.80	47.90	.....	309 55 45.22	+ 2.56	+ 0.01	-1 7.34	+89 0 14.59
		W	...	19 20 28.0	3 16.9	48.60	47.80	.....	50 3 26.65	+ 2.39	- 0.38	+1 7.36	
17	225 B. Draconis	E	2.5	19 25 17.0	2 12.6	48.70	47.75	.....	319 30 27.62	+ 2.36	+ 2.11	- 48.10	+79 25 10.97
		W	...	19 30 1.0	2 31.4	48.50	47.70	.....	40 28 44.50	+ 2.24	- 2.75	+ 48.22	
18	10 Vulpeculæ	W	2	19 37 2.2	2 44.1	47.90	47.05	.....	346 36 48.15	+ 1.61	+44.56	- 13.45	+25 32 59.36
		E	...	19 41 54.5	2 8.2	49.10	48.10	.....	13 22 6.68	+ 2.85	-27.21	+ 13.45	
19	υ Draconis	E	3	19 46 11.0	2 20.3	49.20	48.05	.....	328 53 22.12	+ 2.82	+ 5.52	- 34.09	+70 1 58.99
		W	...	19 51 3.0	2 31.7	49.00	47.75	.....	31 5 50.50	+ 2.59	- 6.45	+ 34.08	
20	h ² Cygni	W	3	20 6 .....	.....	47.65	46.95	27.527	357 36 29.25	+ 0.83	- 0.16	- 2.33	+36 33 56.15
		E	...	.....	.....	49.35	47.95	27.527	2 19 4.25	+ 1.82	+ 0.50	+ 2.33	

Time	Ther.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
14 7 3	42.6			4. Instrument in meridian, observation at IX with movable thread.	1	359 59 36.04	-31.96
7 15	42.5			20. Instrument in meridian; W. observation at VIII; E. observation at IX + 10° with movable thread.	2	35 40	-32.78
7 20	42.4	41.8	30.521		3	36.24	
15 12 11	65.5	59.1	30.522		4	35.96	
12 15	65.2				5	36.78	-31.95
12 20	65.2				6	35.86	
12 25	65.9				7	36.02	
12 29	65.6	58.1	30.528		8	36.08	-31.11
16 6 28	41.9	41.7	29.975		9	36.04	-31.85
7 1	41.1				10	35.92	-32.71
7 14	45.7				11	36.05	
7 17	40.6	41.1	29.980		12	36.06	-31.31
7 22	41.0	41.4	29.981		13	36.28	
17 10 1	64.7	66.1	29.947	Notes.	14	38.40	
10 12	63.6			8. Paint; clouds.	15	37.66	
10 20	63.1			Original record increased 20".	16	38.24	
10 25	62.7				17	38.06	-31.11
10 40	62.6				18	38.12	-28.07
10 50	62.9	64.4	29.948		19	38.54	
					20	37.16	-31.96

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	176 B. Cygni	W E	2.5 ...	20 17 .... .....	..... .....	48.05 49.40	46.90 47.85	26.953 26.953	0 9 28.42 359 46 54.30	+0.92 +2.07	-0.27 +0.27	+0.19 -0.19	+39 6 33.21
2	42 Cygni	E W	2.5 ...	20 26 .... .....	..... .....	49.50 47.85	48.30 46.80	26.397 26.397	2 45 10.60 357 11 54.28	+3.81 +2.25	+0.24 -0.24	+2.75 -2.75	+36 8 34.88
3	ϕ Capricorni	W E	3.5 ...	20 38 3.0 20 42 18.0	2 24.9 1 50.1	46.90 49.25	45.90 47.80	..... .....	295 29 26.18 64 29 41.98	+0.55 +2.74	+8.90 -5.14	-1 58.39 +1 58.44	-25 36 43.58
4	19 Capricorni	E W	3.5 ...	20 46 36.0 20 51 38.0	2 49.5 2 12.5	49.70 47.55	48.55 46.25	..... .....	57 10 32.40 302 48 43.22	+3.28 +1.02	-13.77 +8.42	+1 27.83 -1 27.84	-18 16 55.65
5	A Capricorni	W E	3.5 ...	20 58 58.0 21 3 32.0	2 36.0 1 58.0	46.85 49.25	46.00 48.15	..... .....	295 42 59.65 64 16 7.15	+0.54 +2.83	+10.35 -5.92	-1 57.34 +1 57.36	-25 23 7.30
6	α Equulei	E W	2.5 ...	21 8 34.0 21 13 24.0	2 30.6 2 19.4	49.90 47.75	48.65 46.45	..... .....	34 3 3.35 325 56 12.08	+3.47 +1.32	-17.12 +14.67	+38.42 -38.43	+4 51 27.57
7	ζ Capricorni	W E	3.5 ...	21 18 40.0 21 23 25.0	2 34.5 2 10.5	47.70 48.95	46.55 47.25	..... .....	298 16 33.08 61 42 36.60	+1.24 +2.25	+10.60 -7.56	-1 45.32 +1 45.35	-22 49 21.71
8	ξ Aquarii	E W	3 ...	21 30 2.0 21 34 48.0	2 39.8 2 6.2	49.30 48.30	48.05 47.25	..... .....	47 10 48.32 312 48 27.90	+2.85 +1.90	-14.62 +9.12	+1 1.39 -1 1.42	-8 16 43.41
9	14 Pegasi	W E	3 ...	21 46 .... .....	..... .....	47.20 48.60	46.35 47.50	28.123 28.123	350 46 26.28 9 8 21.72	+0.15 +1.44	-0.19 +0.19	-9.22 +9.22	+29 44 9.03
10	28 Aquarii	E W	2.5 ...	21 53 29.5 21 58 22.0	2 44.2 2 8.3	49.55 48.10	48.45 46.75	..... .....	38 45 21.92 321 13 56.60	+3.20 +1.64	-18.27 +11.16	+45.84 -45.86	+0 9 2.23
11	λ Cephei	W E	3 ...	22 5 43.0 22 10 36.0	2 36.4 2 16.6	47.25 48.70	46.10 47.25	..... .....	20 1 14.32 339 58 1.82	+0.82 +2.20	-15.63 +11.92	+20.85 -20.85	+58 56 59.45
12	3 Lacertæ	E W	2.5 ...	22 17 35.0 22 22 16.0	2 16.1 2 24.9	49.45 48.30	48.05 47.05	..... .....	347 9 18.00 12 49 54.92	+2.95 +1.89	+21.90 -24.83	-13.04 +13.04	+51 45 24.41
13	ν Aquarii	W E	3.5 ...	22 27 14.0 22 31 43.0	2 16.1 2 12.9	47.70 49.00	46.50 47.60	..... .....	299 54 8.85 60 5 2.82	+1.31 +2.46	+8.45 -8.06	-1 39.17 +1 39.19	-21 11 41.67
14	51 H. Cephei	E W	3.5 ...	6 52 46.0 6 57 30.0	3 20.2 1 23.8	49.10 49.50	46.55 47.20	..... .....	311 44 26.62 48 14 45.52	+0.67 +1.22	+1.12 -0.20	-1 5.12 +1 5.00	+87 11 30.93
15	25 H. Camelop.	E W	3.5 ...	7 6 15.0 7 10 50.0	4 49.8 0 14.8	49.05 49.75	46.50 47.15	..... .....	316 20 20.52 43 38 45.42	+0.61 +1.33	+6.65 -0.02	-55.17 +55.07	+82 35 21.41
16	τ Draconis S. P.	W E	3.5 ...	7 15 8.0 7 19 16.0	2 16.1 1 51.9	49.20 48.80	46.45 46.05	..... .....	67 50 45.30 292 8 28.18	+0.70 +0.27	+2.45 -1.66	+2 20.78 -2 20.60	+73 11 11.67
17	225 B. Draconis S. P.	E W	3.5 ...	7 25 10.0 7 30 13.0	2 19.5 2 43.5	49.40 49.65	46.25 46.90	..... .....	298 21 52.60 61 37 17.65	+0.76 +1.18	-1.72 +2.37	-1 46.18 +1 46.12	+79 25 12.26
18	ϵ Draconis S. P.	W E	4 ...	7 46 3.0 7 51 10.0	2 28.3 2 38.7	48.65 48.55	46.20 46.30	..... .....	70 59 31.88 288 59 42.62	+0.32 +0.33	+3.37 -3.86	+2 45.59 -2 45.61	+70 1 59.35
19	October 18, L. 51 H. Cephei S. P.	E W	3.5 ...	18 50 46.0 18 55 14.0	5 20.5 0 52.5	50.45 50.55	49.15 49.65	..... .....	306 7 41.85 53 51 30.20	+0.51 +0.81	-2.64 +0.07	-1 15.48 +1 15.49	+87 11 32.04
20	λ Aquilæ	W E	3 ...	18 59 6.0 19 3 18.0	2 5.8 2 6.2	50.55 50.80	49.50 49.40	..... .....	316 3 44.00 43 55 26.92	+0.74 +0.81	+9.64 -9.70	-53.19 +53.21	-5 1 18.22

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
17 20 21	61.6	.....	.....	1, 9. Instrument in meridian, observation at IX with movable thread.				1	359 59 38.32	-32.69
20 29	61.3	.....	.....	2. Instrument in meridian, observation at I with movable thread.				2	38.23	-32.31
20 41	60.6	.....	.....					3	37.63	.....
20 49	60.3	62.3	29.946					4	37.28	-17.12
21 2	60.2	.....	.....					5	37.31	-15.00
21 11	59.6	.....	.....					6	38.88	.....
21 22	59.5	.....	.....					7	38.12	.....
21 33	59.0	61.2	29.950					8	37.72	.....
21 44	58.5	.....	.....					9	38.04	-31.03
21 56	57.3	.....	.....					10	38.12	-23.88
22 9	56.9	.....	.....					11	37.72	-33.45
22 21	56.7	.....	.....					12	37.42	.....
22 30	56.5	58.7	29.948					13	37.94	-17.93
6 56	47.9	49.9	29.871					14	37.42	.....
7 9	50.5	.....	.....	Note.				15	37.20	.....
7 18	52.1	.....	.....	19. Very faint.				16	37.71	.....
7 29	53.0	.....	.....					17	36.39	-33.30
7 50	52.6	54.4	29.881					18	37.33	.....
18 18 54	72.2	.....	.....					19	35.40	.....
19 2	71.8	73.7	29.820					20	36.22	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	0 Lyrae	E W	2 ...	19 13 .... .....	..... .....	50.70 50.70	49.40 49.50	25.164 25.164	0 56 21.35 359 2 22.00	+ 1.42 + 1.47	+ 0.26 - 0.26	+ 0.92 - 0.92	+37 58 15.97
2	143 B. Camelop. s. p.	W E	4 ...	19 20 2.0 19 24 48.0	0 56.7 3 49.3	50.30 50.50	49.05 49.30	..... .....	72 22 8.48 287 37 9.68	+ 0.30 + 0.58	+ 0.52 - 8.52	+2 52.53 -2 52.02	+68 39 16.84
3	0 Cygni	E W	3.5 ...	19 31 19.0 19 36 22.5	2 34.9 2 28.6	50.65 50.55	49.10 49.60	..... .....	348 54 0.92 11 5 5.48	+ 0.61 + 0.76	+34.02 -31.32	- 10.88 + 10.89	+50 0 27.37
4	ε Draconis	W E	2.5 ...	19 45 57.0 19 50 57.0	2 34.4 2 25.6	50.45 50.25	49.05 49.05	..... .....	31 5 50.05 328 53 21.22	+ 0.47 + 0.34	- 6.68 + 5.94	+ 33.53 - 33.55	+70 1 58.51
5	3 H. Ursae Majoris s. p.	E W	4 ...	20 0 21.0 20 5 16.0	2 58.8 1 56.2	50.30 50.75	49.30 49.80	..... .....	287 42 45.72 72 16 27.22	+ 0.46 + 0.92	- 5.16 + 2.18	-2 52.14 +2 52.16	+68 44 56.40
6	24 Vulpeculae	E W	2.5 ...	20 10 4.0 20 15 6.5	2 39.3 2 23.2	51.40 50.75	49.80 49.80	..... .....	14 32 15.82 345 27 0.05	+ 1.25 + 0.95	-39.06 +31.50	+ 14.43 - 14.43	+24 22 59.64
7	δ Draconis s. p.	E W	4 ...	7 9 36.0 7 14 8.0	2 56.6 1 35.4	51.70 51.05	49.45 48.75	..... .....	286 28 11.90 73 31 0.82	+ 1.85 + 1.09	- 5.28 + 1.54	-3 9.15 +3 9.16	+67 30 6.56
8	143 B. Camelop.	W E	2.5 ...	7 18 27.5 7 23 15.5	2 31.3 2 16.7	50.25 51.35	48.35 49.20	..... .....	29 43 11.28 330 16 2.80	+ 0.48 + 1.52	- 7.13 + 5.82	+ 32.35 - 32.35	+68 39 16.40
9	0 Geminorum	E W	2.5 ...	7 33 .... .....	..... .....	51.70 51.25	49.30 49.00	27.037 27.037	4 5 18.08 355 50 54.08	+ 2.45 + 2.03	+ 0.23 - 0.23	+ 4.09 - 4.09	+34 47 59.82
10	166 B. Camelop.	W E	2.5 ...	7 46 13.0 7 51 19.0	2 34.7 2 31.3	50.20 51.40	48.05 49.05	..... .....	35 13 45.22 324 45 29.75	+ 0.34 + 1.45	- 4.80 + 4.59	+ 40.05 - 40.05	+74 9 59.34
11	3 H. Ursae Majoris October 19, L.	E W	3 ...	8 0 53.0 8 5 53.0	2 26.8 2 33.2	51.90 51.50	49.50 49.40	..... .....	330 10 23.08 29 48 48.78	+ 1.86 + 1.63	+ 6.66 - 7.26	- 32.52 + 32.52	+68 44 55.10
12	δ Draconis	E W	2.5 ...	19 9 32.0 19 13 31.0	3 0.7 0 58.3	50.55 51.10	49.05 49.90	..... .....	331 25 7.60 28 33 55.92	+ 0.23 + 0.98	+11.08 - 1.15	- 30.38 + 30.39	+67 30 5.06
13	143 B. Camelop. s. p.	E W	3.5 ...	19 20 4.0 19 24 38.0	0 54.9 3 39.1	51.00 51.55	49.30 50.15	..... .....	287 37 2.65 72 21 59.22	+ 0.57 + 1.35	- 0.49 + 7.78	-2 53.80 +2 53.84	+68 39 16.57
14	0 Cygni	W E	2.5 ...	19 31 21.0 19 36 6.3	2 33.0 2 12.3	50.85 50.55	49.40 48.70	..... .....	11 5 7.22 348 54 10.35	+ 0.55 + 0.11	-33.20 +24.83	+ 10.96 - 10.96	+50 0 27.40
15	166 B. Camelop. s. p.	E W	3 ...	19 46 12.0 19 51 2.0	2 35.9 2 14.1	50.80 51.30	48.95 49.75	..... .....	293 7 5.60 66 52 4.98	+ 0.31 + 0.90	- 3.06 + 2.26	-2 10.28 +2 10.33	+74 10 0.25
16	4 B. Ursae Minoris s. p.	W E	2 ...	19 57 16.0 20 2 14.0	5 32.7 0 34.7	51.15 50.95	49.45 48.75	..... .....	52 8 18.28 307 50 50.20	+ 0.69 + 0.25	+ 1.12 - 0.01	+1 11.94 -1 11.94	+88 54 46.44
17	ρ Aquilae October 21, L.	E W	2 ...	20 7 26.5 20 12 12.3	2 26.4 2 19.4	51.00 51.35	49.00 49.40	..... .....	24 0 4.12 335 59 8.05	+ 0.48 + 0.81	-21.60 +19.59	+ 24.06 - 24.97	+14 54 44.56
18	4 B. Ursae Minoris s. p.	E W	2.5 ...	19 57 30.0 20 2 18.0	5 21.4 0 33.4	51.50 50.45	50.25 49.45	..... .....	397 50 52.18 52 8 20.62	+ 2.45 + 1.48	- 1.05 + 0.01	-1 12.16 +1 12.21	+88 54 46.75
19	ρ Aquilae	W E	2.5 ...	20 7 10.5 20 12 12.3	2 42.6 2 19.2	49.85 51.15	49.05 50.10	..... .....	335 59 4.20 24 0 3.82	+ 1.00 + 2.27	+26.65 -19.53	- 25.04 + 25.04	+14 54 44.40
20	γ Delphini	W E	3 ...	20 39 50.0 20 44 52.5	2 25.5 2 37.0	49.75 51.65	48.95 50.85	..... .....	336 51 32.15 23 7 44.18	+ 0.93 + 2.89	+22.00 -25.02	- 24.09 + 24.09	+15 47 9.52

Time	Ther. 1882.	Alt. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point	Red. to 1904.0.
19 19 23	69.8	...	...	1.9. Instrument in meridian, observation at I with movable thread.			1	359 50 35.53	.....
19 19 31	69.6	...	...				2	359 50 35.48	.....
19 19 39	69.5	...	...				3	359 50 35.24	.....
19 19 47	69.3	71.1	29.814				4	359 50 35.00	.....
19 19 55	69.2	...	...				5	359 50 34.68	.....
19 20 03	69.0	61.3	29.819				6	359 50 34.28	.....
19 20 11	68.8	...	...				7	359 50 33.96	.....
19 20 19	68.6	...	...				8	359 50 33.68	.....
19 20 27	68.4	60.7	29.816				9	359 50 33.07	+18 30
19 20 35	68.2	68.6	29.820				10	359 50 32.88	.....
19 20 43	68.0	...	...				11	359 50 32.48	.....
19 20 51	67.8	...	...				12	359 50 32.34	.....
19 20 59	67.6	...	...				13	359 50 32.00	.....
19 21 07	67.4	66.9	29.810				14	359 50 31.93	.....
19 21 15	67.2	...	...				15	359 50 31.52	.....
19 21 23	67.0	66.4	29.810				16	359 50 31.26	.....
19 21 31	66.8	66.7	29.810				17	359 50 30.72	-26 26
19 21 39	66.6	...	...				18	359 50 30.87	.....
19 21 47	66.4	...	...				19	359 50 30.20	-26.69
19 21 55	66.2	...	...				20	359 50 30.26	-27 22

Note
2.11. Very faint

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	61 Cygni (<i>1st star</i>)	E	2.5	21 2 . . . .	. . . .	52.50	51.40	25.377	0 37 14.40	+ 4.31	+ 0.26	+ 0.63	+38 17 13.56
		W	...	. . . .	. . . .	50.85	49.60	25.377	359 21 11.45	+ 2.55	- 0.26	- 0.63	
2	σ Cygni	W	3	21 14 . . . .	. . . .	49.95	48.85	27.934	0 2 20.58	+ 0.19	- 0.27	+ 0.08	+39 0 4.16
		E	...	. . . .	. . . .	51.55	50.60	27.934	359 52 43.75	+ 1.92	+ 0.27	- 0.08	
3	ζ Capricorni	E	3	21 18 39.0	2 35.9	51.90	50.70	...	61 42 39.88	+ 2.88	-10.79	+1 44.66	-22 49 22.20
		W	...	21 23 22.0	2 7.1	50.25	49.25	...	298 16 34.88	+ 1.28	+ 7.17	-1 44.70	
4	ξ Aquarii	W	3.5	21 30 18.0	2 24.1	49.10	48.55	...	312 48 26.00	+ 0.33	+11.88	-1 1.04	- 8 16 44.04
		E	...	21 35 0.0	2 17.9	51.30	50.60	...	47 10 46.12	+ 2.52	-10.88	+1 1.08	
5	13 Cephei	E	3.5	21 49 3.0	2 40.4	51.50	50.10	...	342 44 53.15	+ 2.38	+20.50	- 17.60	+56 9 56.64
		W	...	21 54 11.0	2 27.6	51.00	49.95	...	17 14 15.85	+ 2.01	-17.36	+ 17.60	
6	20 Cephei	W	3.5	21 59 31.0	2 38.9	50.50	49.90	...	23 23 42.88	+ 1.81	-12.53	+ 24.54	+62 19 35.37
		E	...	22 4 49.0	2 39.1	50.70	50.15	...	336 35 29.52	+ 2.03	+12.56	- 24.55	
7	ρ Aquarii	E	3	22 13 11.0	2 1.6	51.45	50.55	...	47 11 49.28	+ 2.64	- 8.46	+1 1.21	- 8 17 49.71
		W	...	22 17 33.5	2 20.9	51.40	50.25	...	312 47 19.10	+ 2.43	+11.36	-1 1.24	
8	β Piscis Australis	W	3.5	22 23 33.0	2 33.8	50.35	49.50	...	288 16 56.35	+ 1.48	+ 8.88	-2 49.93	-32 50 4.22
		E	4	22 28 34.0	2 27.2	50.85	50.15	...	71 42 14.98	+ 2.03	- 8.13	+2 49.93	
9	13 Lacertæ	E	2.5	22 40 . . . .	. . . .	51.55	50.70	...	357 35 23.30	+ 3.47	+ 0.29	- 2.38	+41 19 25.60
		W	...	. . . .	. . . .	51.25	50.05	...	2 23 37.20	+ 2.99	- 0.29	+ 2.38	
10	52 Pegasi	W	3	22 52 9.0	2 18.6	50.15	49.20	...	332 17 55.55	+ 1.29	+17.20	- 29.83	+11 13 22.34
	October 22, L.	E	...	22 56 37.0	2 9.4	51.00	50.30	...	27 41 16.05	+ 2.24	-15.00	+ 29.84	
11	τ Draconis	W	3	19 15 12.0	2 12.1	51.65	50.95	...	34 14 56.58	+ 2.02	- 3.80	+ 38.71	+73 11 11.88
		E	...	19 19 35.0	2 10.9	51.50	50.45	...	325 44 16.58	+ 1.77	+ 3.74	- 38.73	
12	225 B. Draconis	E	3	19 25 30.0	1 59.4	51.40	50.50	...	319 30 28.62	+ 1.64	+ 1.71	- 48.57	+79 25 11.44
		W	...	19 29 36.0	2 6.6	51.90	51.05	...	40 28 43.82	+ 2.19	- 1.92	+ 48.60	
13	166 B. Camelop. S. P.	W	3.5	19 46 12.0	2 36.4	51.55	50.45	...	66 52 2.50	+ 1.79	+ 3.08	+2 12.82	+74 10 0.15
		E	...	19 50 56.0	2 7.6	51.55	50.20	...	293 7 7.42	+ 1.61	- 2.05	-2 12.89	
14	γ Delphini	E	2.5	20 40 56.0	1 19.4	51.25	50.30	...	23 7 24.78	+ 1.52	- 6.55	+ 24.52	+15 47 9.43
		W	...	20 44 30.3	2 14.9	51.75	50.55	...	336 51 33.25	+ 1.91	+18.91	- 24.54	
15	61 Cygni (<i>1st star</i>)	W	2.5	21 3 . . . .	. . . .	51.25	50.40	28.407	359 19 8.85	+ 0.82	- 0.26	- 0.64	+38 17 12.68
		E	...	. . . .	. . . .	51.60	50.40	28.407	0 35 15.08	+ 1.02	+ 0.26	+ 0.64	
16	σ Cygni	E	3	21 14 . . . .	. . . .	51.75	50.45	25.286	359 54 30.75	+ 2.52	+ 0.27	- 0.08	+39 0 5.12
		W	...	. . . .	. . . .	51.35	50.20	25.286	0 4 8.00	+ 2.29	- 0.27	+ 0.08	
17	β Aquarii	W	3.5	21 24 1.0	2 32.9	50.55	49.30	...	315 5 50.02	+ 0.68	+13.97	- 57.38	- 5 59 14.52
		E	...	21 28 54.0	2 20.1	51.50	50.15	...	44 53 22.68	+ 1.57	-11.73	+ 57.41	
18	41 Capricorni	E	3	21 34 1.0	2 35.4	52.25	50.95	...	62 34 46.00	+ 2.32	-10.57	+1 50.73	-23 41 33.80
		W	3.5	21 38 49.0	2 12.6	50.75	49.40	...	297 24 29.55	+ 0.75	+ 7.69	-1 50.71	
19	Bradley 2868	W	■	21 47 25.5	2 31.3	49.90	48.75	...	16 50 31.68	- 0.02	-18.85	+ 17.47	+55 46 9.82
		E	3	21 52 11.0	2 14.2	51.60	50.25	...	343 8 45.25	+ 1.64	+14.83	- 17.47	
20	20 Cephei	E	2.5	21 59 39.0	2 30.9	52.40	51.05	...	336 35 30.82	+ 2.49	+11.30	- 24.99	+62 19 35.13
		W	3.5	22 4 34.0	2 24.1	50.95	49.35	...	23 23 40.68	+ 0.90	-10.30	+ 25.00	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
21 21 6	55.5	57.7	29.500	1, 16. Instrument in meridian, observation at I with movable thread.	1	359 59 37.46	.....
21 22	55.2	...	...	2, 15. Instrument in meridian, observation at IX with movable thread.	2	38.75	.....
21 33	54.3	...	...	9. Instrument in meridian, observation at I between fixed thread and movable at 25.010 rev.	3	37.63	.....
21 52	54.1	56.4	29.508		4	38.00	.....
22 2	53.7	...	...		5	38.26	-34.58
22 16	53.6	...	...		6	38.13	.....
22 32	53.6	...	...		7	38.16	-21.18
22 55	52.8	55.7	29.518		8	37.80	-13.93
22 19 13	54.6	56.2	29.616		9	37.16	-31.26
19 23	54.1	...	...		10	38.67	-25.64
19 33	53.3	...	...		11	38.44	.....
19 50	52.6	54.9	29.614		12	38.04	-33.19
20 47	50.0	52.3	29.654		13	37.14	.....
21 6	49.4	...	...		14	36.90	-27.69
21 27	48.2	...	...		15	37.74	.....
21 37	48.5	...	...		16	39.17	.....
21 50	48.1	50.3	29.678		17	38.61	.....
22 1	47.6	...	...		18	37.88	-16.84
					19	37.26	-34.73
					20	37.95	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Aquarii	W E	3.5 3	22 13 8.0 22 17 24.0	2 4.6 2 11.4	50.35 52.20	48.90 51.20	..... .....	312 47 25.15 47 11 50.30	+ 0.35 + 2.49	+ 8.88 - 9.88	-1 2.36 +1 2.39	-8 17 49.84
2	β Piscis Australis	E W	4	22 23 32.0 22 28 32.0	2 34.7 2 25.3	52.90 51.45	51.40 49.70	..... .....	71 42 12.70 288 17 1.00	+ 2.85 + 1.30	- 8.98 + 7.93	+2 53.16 -2 53.17	-32 50 4.54
3	13 Lacertæ	W E	3	22 40 ..... .....	..... .....	50.50 52.05	48.95 50.80	28.464 28.464	2 21 19.28 357 33 2.10	- 0.29 + 1.43	- 0.29 + 0.29	+ 2.43 - 2.43	+41 19 26.67
4	52 Pegasi	E W	3	22 52 3.5 22 56 48.5	2 24.1 2 20.9	52.80 51.45	51.40 49.70	..... .....	27 41 17.98 332 17 54.72	+ 2.87 + 1.36	-18.60 +17.78	+ 30.38 - 30.39	+11 13 22.22
5	51 H. Cephei	E W	3.5	6 56 26.0 7 0 30.0	0 16.9 4 20.9	52.65 51.05	50.75 49.00	..... .....	311 44 28.12 48 14 47.02	+ 1.84 + 0.16	+ 0.01 - 1.90	-1 5.77 +1 5.81	+87 11 30.24
6	δ Draconis S. P.	W E	4	7 9 22.0 7 13 22.0	3 10.8 0 49.2	51.60 52.00	49.60 49.45	..... .....	73 30 50.62 286 28 17.20	+ 0.75 + 0.84	+ 6.16 - 0.41	+3 16.57 -3 16.68	+67 30 6.62
7	143 B. Camelop.	E W	3.5	7 18 21.0 7 23 42.0	2 38.5 2 42.5	51.90 52.20	49.45 49.90	..... .....	330 16 4.18 29 43 10.12	+ 0.89 + 1.23	+ 7.82 - 8.22	- 33.64 + 33.65	+68 39 15.56
8	α Geminorum	W E	3.5	7 33 ..... .....	..... .....	51.90 52.20	49.40 49.75	26.441 26.441	355 51 19.52 4 5 45.65	+ 0.10 + 0.46	- 0.23 + 0.23	- 4.25 + 4.25	+34 47 59.08
9	166 B. Camelop.	E W	3.5	7 46 15.0 7 51 13.0	2 33.5 2 24.5	51.70 52.15	49.60 50.00	..... .....	324 45 31.48 35 13 40.68	+ 0.84 + 1.28	+ 4.73 - 4.19	- 41.68 + 41.69	+74 9 58.84
10	3 H. Ursæ Majoris	W E	3.5 3	8 0 41.0 8 5 23.0	2 39.5 2 2.5	52.15 51.65	50.00 49.15	..... .....	29 48 46.38 330 10 26.90	+ 1.23 + 0.52	- 7.87 + 4.04	+ 33.87 - 33.85	+68 44 54.50
11	κ Cephei S. P.	E W	3.5	8 9 42.0 8 15 20.0	2 27.2 3 10.8	51.75 52.20	49.60 50.10	..... .....	296 22 49.60 63 36 10.68	+ 0.82 + 1.28	- 2.23 + 3.75	-1 58.42 +1 58.20	+77 25 56.63
12	October 23, L. τ Draconis S. P.	E W	3.5	7 18 26.0 7 22 4.0	1 1.8 4 39.8	52.30 50.45	50.30 48.15	..... .....	292 8 30.98 67 50 31.70	+ 2.56 + 0.51	- 0.51 +10.35	-2 25.95 +2 26.01	+73 11 12.46
13	225 B. Draconis S. P.	W E	3.5	7 26 24.0 7 30 24.0	1 5.4 2 54.6	50.45 52.50	47.70 50.40	..... .....	61 37 18.28 298 21 57.08	+ 0.34 + 2.80	+ 0.38 - 2.70	+1 50.44 -1 50.49	+79 25 11.82
14	ϵ Draconis S. P.	E W	3.5 4	7 46 5.0 7 51 14.0	2 26.5 2 42.5	52.25 52.30	50.10 49.95	..... .....	288 50 48.28 70 59 22.48	+ 2.51 + 2.43	- 3.29 + 4.05	-2 52.32 +2 52.32	+70 2 0.15
15	4 B. Ursæ Minoris	W E	3	7 58 56.0 8 3 56.0	3 58.6 1 1.4	51.85 52.05	49.45 49.65	..... .....	49 57 53.72 310 1 20.30	+ 1.08 + 2.15	- 0.60 + 0.04	+1 11.20 -1 11.19	+88 54 44.30
16	κ Cephei S. P.	E W	3	8 9 24.0 8 14 58.0	2 45.2 2 48.8	52.35 51.75	50.00 49.45	..... .....	296 22 53.05 63 36 18.95	+ 2.46 + 1.83	- 2.81 + 2.94	-2 0.24 +2 0.27	+77 25 57.44
17	181 B. Camelop.	W E	3 3.5	8 25 17.0 8 31 30.0	3 50.1 2 22.9	51.45 52.45	48.95 49.75	..... .....	35 1 15.25 324 58 7.60	+ 1.40 + 2.40	-10.81 + 4.17	+ 41.95 - 41.93	+73 57 24.59
18	October 24, L. τ Draconis	E W	3	19 16 24.0 19 20 41.0	1 0.1 3 16.9	51.15 52.00	50.70 51.50	..... .....	325 44 20.85 34 14 59.28	+ 0.40 + 1.27	+ 0.79 - 8.45	- 39.56 + 39.59	+73 11 11.40
19	225 B. Draconis	W E	3 2.5	19 25 5.0 19 30 12.0	2 24.3 2 42.7	52.05 51.50	51.45 50.60	..... .....	40 28 42.82 319 30 27.58	+ 1.27 + 0.54	- 2.49 + 3.18	+ 40.65 - 49.68	+79 25 11.62
20	ϵ Draconis	E W	3 3.5	19 46 7.0 19 51 12.0	2 24.5 2 40.5	51.65 52.15	50.75 51.45	..... .....	328 53 24.32 31 5 49.25	+ 0.75 + 1.38	+ 5.86 - 7.22	- 35.15 + 35.16	+70 1 58.20

Time	Ther- 1902.	Alt- ther	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>			<i>m</i>	18. Instrument in meridian, observation at IX with movable thread.						
22 22 15	47.3							1	359 59 38.66	-21.10
22 22 45	47.3							2	38.40	-13.77
22 23 15	47.2	48.7	29.684					3	38.43	-31.38
22 23 45	47.2	41.4	29.714					4	38.05	-25.62
22 24 15	47.2							5	37.64	
22 24 45	47.2							6	37.32	
22 25 15	47.2							7	38.02	
22 25 45	47.2	39.9	29.718					8	37.42	+18.53
22 26 15	47.2							9	37.42	
22 26 45	47.2	40.8	29.716					10	35.91	
22 27 15	47.2							11	36.34	
22 27 45	47.2	38.1	30.014					12	37.82	
22 28 15	47.2							13	38.06	-33.17
22 28 45	47.2							14	38.21	
22 29 15	47.2							15	38.80	
22 29 45	47.2	37.9	30.043					16	38.22	
22 30 15	47.2							17	40.09	+31.92
22 30 45	47.2	31.9	30.094					18	37.68	
22 31 15	47.2							19	36.44	-35.16
22 31 45	47.2							20	37.18	

Note
17 E. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	4 H. Ursæ Majoris s. p.	W E	3.5 ...	20 0 43.0 20 5 4.0	2 37.7 1 43.3	51.95 51.90	51.15 50.60	..... .....	72 16 16.58 287 42 50.90	+ 1.05 + 0.77	+ 4.01 - 1.72	+3 0.58 -3 0.65	+68 44 56.74
2	κ Cephei	E W	3 ...	20 9 39.0 20 14 46.0	2 30.1 2 36.9	51.50 52.30	50.65 51.35	..... .....	321 29 39.10 38 29 31.65	+ 0.63 + 1.39	+ 3.34 - 3.65	+ 46.41 - 46.43	+77 25 56.38
3	181 B. Camelop. s. p.	W E	3.5 ...	20 26 30.0 20 31 42.0	2 37.2 2 34.8	52.05 51.95	50.95 50.85	..... .....	67 4 33.02 292 54 38.52	+ 1.01 + 0.92	+ 3.15 - 3.05	+2 17.39 -2 17.43	+73 57 25.40
4	ε Aquarii	E W	3 ...	20 40 9.0 20 44 40.0	2 23.3 2 7.7	52.25 52.40	50.80 51.20	..... .....	48 44 27.10 311 14 47.02	+ 1.02 + 1.32	-11.42 + 9.07	+1 6.60 -1 6.60	- 9 50 29.44
5	ε Draconis s. p.	W E	3.5 ...	7 46 12.0 7 51 16.0	2 19.5 2 44.5	51.55 52.25	49.65 50.30	..... .....	70 59 26.22 288 59 47.75	+ 0.14 + 0.84	+ 2.98 - 4.14	+2 50.94 -2 50.95	+70 1 59.81
6	4 B. Ursæ Minoris	E W	2.5 ...	7 59 18.0 8 4 14.0	3 37.9 1 18.1	52.40 52.20	50.40 50.05	..... .....	310 1 18.25 49 57 52.52	+ 0.94 + 0.70	+ 0.50 - 0.06	-1 10.66 +1 10.66	+88 54 44.20
7	κ Cephei s. p.	W E	4 ...	8 9 36.0 8 14 52.0	2 33.1 2 42.9	51.85 52.40	50.00 50.40	..... .....	63 36 20.75 296 22 51.15	+ 0.40 + 0.92	+ 2.42 - 2.74	+1 59.32 -1 59.35	+77 25 56.74
8	181 B. Camelop.	E W	2.5 ...	8 25 17.0 8 31 12.0	3 50.3 2 4.7	52.40 52.10	50.65 50.30	..... .....	324 57 57.85 35 1 6.08	+ 1.11 + 0.73	+10.83 - 3.18	+ 41.67 + 41.67	+73 57 25.39
9	October 25, L. ε Draconis	W E	2.5 ...	19 46 29.0 19 52 20.0	2 2.6 3 48.4	50.90 51.15	50.40 50.35	..... .....	31 5 49.08 328 51 45.35	+ 0.59 + 0.69	- 4.22 +14.63	+ 34.44 - 34.44	+70 1 59.86
10	October 27, L. Groombridge 3402	W E	3 ...	19 53 28.0 19 59 20.0	1 23.8 4 28.2	52.50 51.95	51.50 51.00	..... .....	49 53 55.80 310 5 14.62	+ 1.57 + 0.99	- 0.08 + 0.80	+1 9.50 -1 9.47	+88 50 46.71
11	173 B. Camelop. s. p.	E W	3.5 ...	20 4 27.0 20 9 34.0	3 8.9 1 58.1	52.10 52.55	51.00 51.80	..... .....	294 59 32.28 64 59 41.35	+ 1.07 + 1.72	- 4.03 + 1.57	-2 4.89 +2 4.89	+76 2 30.66
12	κ Cephei	W E	3 ...	20 13 13.0 20 17 21.0	1 3.8 5 11.8	52.45 52.30	51.40 50.95	..... .....	38 29 28.22 321 29 27.78	+ 1.46 + 1.15	- 0.60 +14.41	+ 46.55 - 46.56	+77 25 56.21
13	181 B. Camelop. s. p.	E W	3 ...	20 26 32.0 20 31 42.0	2 35.9 2 34.1	52.00 52.25	51.20 51.60	..... .....	292 54 38.62 67 4 32.12	+ 1.08 + 1.41	- 3.09 + 3.02	-2 17.70 +2 17.74	+73 57 25.52
14	ε Aquarii	W E	3 ...	20 40 24.0 20 45 11.0	2 8.6 2 38.4	51.65 51.60	50.85 50.60	..... .....	311 14 46.72 48 44 30.98	+ 0.73 + 0.56	+ 9.19 -13.95	-1 6.79 +1 6.85	- 9 50 30.51
15	ξ Cygni	E W	2.5 ...	21 1 ..... .....	..... .....	51.90 51.90	51.55 51.25	25.352 25.352	355 21 21.68 4 37 7.22	+ 1.97 + 1.81	+ 0.32 - 0.32	- 4.76 + 4.76	+43 33 13.92
16	τ Cygni	W E	2.5 ...	21 11 ..... .....	..... .....	51.90 52.05	51.15 51.40	27.167 27.167	358 41 28.12 1 14 36.12	+ 0.31 + 0.48	- 0.26 + 0.26	- 1.31 + 1.31	+37 38 41.13
17	9 Cygni	E W	2 ...	21 26 ..... .....	..... .....	52.55 51.95	51.70 51.05	25.142 25.142	352 47 10.52 7 11 34.22	+ 2.38 + 1.76	+ 0.35 - 0.35	- 7.44 + 7.44	+46 7 35.42
18	41 Capricorni	W E	3.5 ...	21 34 14.0 21 38 50.0	2 22.9 2 13.1	51.00 52.85	49.85 52.00	..... .....	297 24 29.40 62 34 40.55	- 0.13 + 1.93	+ 8.94 - 7.75	-1 53.03 +1 53.16	-23 41 34.57
19	173 B. Camelop.	E W	2.5 ...	8 4 19.0 8 8 12.0	3 17.0 0 36.0	52.70 52.60	50.95 50.95	..... .....	322 53 3.72 37 6 3.15	+ 0.80 + 0.79	+ 6.58 - 0.22	- 45.62 + 45.61	+76 2 28.71
20	κ Cephei s. p.	W E	3 ...	8 12 6.0 8 16 38.0	0 3.1 4 28.9	52.65 52.75	50.80 50.95	..... .....	63 36 20.35 296 22 59.55	+ 0.66 + 0.82	0.00 - 7.45	+2 1.11 -2 1.13	+77 25 58.05

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1004.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° / "</i>	<i>"</i>
24 20 4	49.5	.....	.....	9 E. Instrument in meridian, observation assumed to be with movable thread at 27.003 rev.						1	359 59 35.76	.....
20 13	49.2	.....	.....	15, 17. Instrument in meridian, observation at I with movable thread.						2	36.24	.....
20 30	48.8	.....	.....	16. Instrument in meridian, observation at IX with movable thread.						3	36.76	+31.98
20 43	48.3	50.7	30.092							4	37.06	.....
7 50	40.7	42.7	30.084							5	36.89	.....
8 3	40.6	.....	.....							6	36.42	.....
8 13	40.3	.....	.....							7	36.44	.....
8 32	40.3	42.7	30.093							8	36.71	+32.04
25 19 53	58.6	60.2	29.996							9	36.82	.....
27 19 56	45.9	48.6	29.979							10	36.86	-33.90
20 7	46.3	.....	.....							11	36.98	.....
20 18	40.0	.....	.....							12	36.90	.....
20 30	45.8	.....	.....							13	36.60	+32.36
20 44	44.9	.....	.....							14	37.14	.....
21 9	44.2	.....	.....							15	36.43	-34.38
21 30	43.9	46.3	29.980							16	36.72	.....
21 38	43.0	.....	.....							17	35.96	-34.75
7 58	33.6	35.8	30.068							18	36.54	-15.40
8 7	33.4	.....	.....							19	37.40	.....
8 20	33.1	.....	.....							20	36.96	.....

Note.
8 W, 10. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	181 B. Camelop.	W	2.5	8 26 34.0	2 33.9	52.65	50.65	.....	35 1 6.00	+ 0.63	- 4.84	+ 42.30	+73 57 23.99
	October 28, L.	E	...	8 31 28.0	2 20.1	52.65	50.70	.....	324 58 7.28	+ 0.70	+ 4.01	- 42.31	
2	α Aquilæ	W	3	19 45 10.0	0 59.5	52.40	52.35	.....	329 42 8.20	+ 0.80	+ 2.94	- 34.17	+ 8 37 17.81
		E	...	19 49 38.0	3 28.5	52.30	51.60	.....	30 17 37.35	+ 0.34	-36.14	+ 34.19	
3	Groombridge 3402	E	3	19 55 2.0	0 11.3	52.30	51.65	.....	310 5 16.30	+ 0.35	0.00	-1 9.46	+88 50 45.88
		W	...	19 59 30.0	4 39.3	52.95	52.45	.....	49 53 55.65	+ 1.13	- 0.87	+1 9.46	
4	173 B. Camelop. S. P.	W	3	20 5 18.0	2 18.2	52.90	52.45	.....	64 59 40.05	+ 1.08	+ 2.16	+2 4.96	+76 2 30.97
		E	...	20 9 8.0	1 31.8	52.80	51.60	.....	294 59 29.12	+ 0.59	- 0.95	-2 4.99	
5	Groombridge 1418 S. P.	E	3	20 22 8.0	4 27.8	49.25	50.45	.....	304 19 28.10	+ 2.06	- 2.96	-1 25.70	+85 23 7.60
		W	...	20 26 34.0	0 1.8	49.75	50.70	.....	55 39 44.50	+ 2.46	0.00	+1 25.76	
6	73 Draconis	W	2.5	20 30 28.0	2 21.4	49.70	50.90	.....	35 41 47.80	+ 2.55	- 3.85	+ 42.19	+74 38 8.49
		E	...	20 35 12.0	2 22.6	49.45	50.05	.....	324 17 21.60	+ 1.97	+ 3.92	- 42.20	
7	γ Cephei	E	3	20 40 28.0	2 55.6	49.20	50.05	.....	337 26 26.80	+ 1.79	+16.29	- 24.42	+61 28 33.83
		W	...	20 45 27.0	2 3.4	49.55	50.85	.....	22 32 35.80	+ 2.38	- 8.05	+ 24.42	
8	ϵ Cygni	W	2.5	21 1 1.0	.....	50.05	50.70	27.950	4 35 23.38	+ 1.87	- 0.32	+ 4.77	+43 33 15.91
		E	...	.....	.....	49.75	50.25	27.950	355 19 34.40	+ 1.50	+ 0.32	- 4.77	
9	τ Cygni	E	2	21 11 1.0	.....	49.50	50.30	26.146	1 15 15.50	+ 2.83	+ 0.26	+ 1.31	+37 38 41.57
		W	...	.....	.....	49.65	50.65	26.146	358 42 7.88	+ 3.14	- 0.26	- 1.31	
10	72 Cygni	W	2.5	21 31 1.0	.....	49.50	50.40	27.394	359 9 22.15	+ 1.43	- 0.26	- 0.83	+38 6 46.05
		E	...	.....	.....	49.85	50.40	27.394	0 46 21.32	+ 1.57	+ 0.26	+ 0.83	
11	κ Pegasi	W	3	21 37 42.5	2 39.5	48.85	49.45	.....	346 16 36.32	+ 1.31	+41.20	- 14.41	+25 12 43.99
		E	...	21 41 45.0	1 23.0	49.75	50.30	.....	13 42 4.60	+ 2.17	-11.16	+ 14.40	
12	Bradley 2868	E	3	21 47 11.0	2 46.4	49.45	50.15	.....	343 8 36.55	+ 1.98	+22.80	- 17.89	+55 46 10.51
		W	...	21 52 9.0	2 11.6	49.70	50.25	.....	16 50 25.10	+ 2.15	-14.26	+ 17.90	
13	ν Pegasi	W	3.5	21 58 7.0	2 47.6	49.15	49.45	.....	325 40 24.50	+ 1.46	+21.07	- 40.34	+ 4 35 46.66
		E	...	22 3 23.0	2 28.4	49.95	50.45	.....	34 18 40.75	+ 2.39	-16.52	+ 40.33	
14	47 Aquarii	E	3	22 13 46.0	2 36.9	50.40	51.10	.....	60 57 44.02	+ 3.01	-11.07	+1 46.17	-22 4 28.28
		W	...	22 18 56.0	2 33.1	49.55	50.05	.....	299 1 25.60	+ 2.02	+10.54	-1 46.17	
15	κ Aquarii	W	3.5	22 30 16.0	2 35.6	48.40	49.15	.....	316 22 0.20	+ 1.00	+14.84	- 56.29	- 4 43 0.95
		E	...	22 35 10.0	2 18.4	49.70	50.80	.....	43 37 8.22	+ 2.46	-11.74	+ 56.29	
16	μ Pegasi	E	3	22 42 41.5	2 45.3	50.25	50.95	.....	14 49 6.02	+ 2.83	-41.37	+ 15.64	+24 6 10.05
		W	...	22 47 25.5	1 58.7	49.10	49.80	.....	345 10 22.32	+ 1.61	+21.34	- 15.63	
17	β Piscium	W	3	22 56 17.0	2 47.1	47.70	48.65	.....	324 23 18.98	+ 0.35	+20.32	- 42.28	+ 3 18 36.02
		E	...	23 1 16.0	2 11.9	49.35	50.45	.....	35 35 47.15	+ 2.14	-12.66	+ 42.28	
18	5 H ¹ . Cassiopeiæ	W	3	23 6 6.0	2 39.5	48.50	49.40	.....	17 43 8.90	+ 1.13	-19.49	+ 18.88	+56 38 49.29
		E	...	23 10 51.0	2 5.5	49.70	50.75	.....	342 16 8.75	+ 2.49	+12.07	- 18.88	
19	4 Cassiopeiæ	E	3	23 18 9.0	2 31.6	49.95	51.25	.....	337 9 12.90	+ 2.82	+11.88	- 24.91	+61 45 51.45
		W	...	23 23 20.0	2 39.4	48.80	49.45	.....	22 49 58.88	+ 1.36	-13.14	+ 24.92	
20	248 G. Aquarii	W	3	23 28 10.0	2 29.6	48.25	49.25	.....	313 5 46.48	+ 0.96	+12.88	-1 3.15	- 7 59 23.78
		E	...	23 33 7.0	2 27.4	50.10	50.90	.....	46 53 24.92	+ 2.74	-12.50	+1 3.15	

Time	Ther- m.	Atm. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>	<i>in</i>	<i>in</i>			
27 8 29	11.2	14.7	10.060	8.10	Instrument in meridian, observation at IX with movable thread.	1	359 59 36.88	+32.42
28 19 48	47.6	49.8	10.069	9	Instrument in meridian, observation at I with movable thread.	2	36.76	
29 2	47.5					3	36.28	-31.94
29 12	47.2					4	36.01	
29 20	46.2					5	37.11	+34.40
29 34	47.9					6	36.99	
29 42	46.1	48.1	10.071			7	37.50	
29 59	44.7					8	36.76	-34.44
30 29	41.6					9	37.18	
30 47	43.3					10	36.72	-31.60
31 10	42.8	48.6	10.064			11	37.22	-30.67
31 17	42.6					12	37.16	-35.00
31 34	42.9					13	36.82	-24.87
31 47	41.2	44.8	10.062	1	Very faint, poor observation	14	37.06	-16.68
31 59	41.1			5	Very faint	15	37.49	-21.81
32 12	41.2					16	36.38	
32 21	42.3					17	38.14	-23.64
32 31	42.1	44.7	10.062			18	36.92	
						19	37.16	
						20	37.74	-19.98

Notes

Very faint, poor observation

Very faint

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Groombridge 3402 S. P.	E W	3 ...	7 53 40.0 7 59 4.0	1 10.0 4 14.0	50.40 49.40	50.75 49.85	..... .....	307 46 56.40 52 12 13.85	+ 1.56 + 0.55	- 0.05 + 0.70	-1 17.23 +1 17.23	+88 50 47.39
2	173 B. Camelop.	W E	2.5 ...	8 5 3.0 8 10 4.0	2 33.2 2 27.8	49.10 50.05	49.30 50.15	..... .....	37 6 7.35 322 53 4.50	+ 0.21 + 1.08	- 3.98 + 3.71	+ 45.36 - 45.36	+76 2 29.29
3	Groombridge 1418	E W	2.5 ...	8 22 4.0 8 27 16.0	4 32.0 0 40.0	50.30 49.35	50.70 49.35	..... .....	313 32 44.98 46 26 21.38	+ 1.47 + 0.28	+ 3.49 - 0.08	-1 2.91 +1 2.94	+85 23 5.53
4	73 Draconis S. P.	W E	3 ...	8 31 20.0 8 36 31.0	1 29.4 3 41.6	49.05 50.30	49.15 50.50	..... .....	66 23 53.10 293 35 23.92	+ 0.09 + 1.40	+ 0.98 - 6.03	+2 16.40 -2 16.41	+74 38 9.37
5	ρ Ursæ Majoris	E W	2.5 ...	8 51 14.0 8 56 4.0	2 44.1 2 5.9	50.50 49.50	50.75 49.50	..... .....	330 55 33.10 29 3 34.28	+ 1.66 + 0.49	+ 8.81 - 5.19	- 33.27 + 33.27	+67 59 43.07
6	October 29, L. α Aquilæ	E W	2 ...	19 43 28.5 19 48 29.0	2 41.0 2 19.5	50.20 48.80	51.40 50.25	..... .....	30 17 22.32 329 41 53.00	+ 2.27 + 0.99	-21.56 +16.18	+ 33.65 - 33.67	+ 8 37 16.70
7	4 B. Ursæ Minoris S. P.	W E	2.5 ...	19 59 6.0 20 3 22.0	3 56.5 0 19.5	48.55 49.85	49.95 51.00	..... .....	52 8 18.48 307 50 51.05	+ 0.64 + 1.86	+ 0.57 - 0.00	+1 14.15 -1 14.18	+88 54 45.65
8	33 Cygni	E W	3 ...	20 9 11.0 20 13 41.0	2 2.0 2 28.0	50.05 48.75	51.10 50.00	..... .....	342 37 56.32 17 21 18.48	+ 2.07 + 0.81	+11.75 -17.29	- 18.08 + 18.09	+56 17 0.81
9	Groombridge 1418 S. P.	W E	3 ...	20 22 20.0 20 27 12.0	4 16.2 0 35.8	48.60 49.55	49.90 51.00	..... .....	55 39 43.52 304 19 22.52	+ 0.70 + 1.73	+ 2.71 - 0.05	+1 24.53 -1 24.59	+85 23 7.29
10	73 Draconis	E W	3 ...	20 31 44.0 20 35 46.0	1 5.4 2 56.6	49.65 48.50	51.00 50.00	..... .....	324 17 23.18 35 41 52.60	+ 1.78 + 0.70	+ 0.82 - 6.01	- 41.61 + 41.62	+74 38 9.16
11	η Cephei	W E	2.5 3	20 40 46.5 20 45 47.0	2 37.2 2 23.3	48.50 49.45	49.75 50.65	..... .....	22 32 41.18 337 26 31.02	+ 0.52 + 1.47	-13.05 +10.85	+ 24.06 - 24.06	+61 28 33.51
12	ρ Ursæ Majoris S. P.	E W	3.5 ...	20 51 22.0 20 56 6.0	2 36.2 2 7.8	49.55 48.30	50.85 49.75	..... .....	286 57 44.48 73 1 25.78	+ 1.68 + 0.46	- 4.06 + 2.71	-3 7.64 +3 7.64	+67 59 42.15
13	October 30, L. Groombridge 3402 S. P.	W E	3 ...	7 52 2.0 7 56 44.0	2 45.6 1 50.4	49.85 49.45	49.60 49.65	..... .....	52 12 14.78 307 46 58.08	+ 1.71 + 1.55	+ 0.30 - 0.15	+1 17.89 -1 17.91	+88 50 46.65
14	4 B. Ursæ Minoris	E W	3 ...	8 0 56.0 8 5 16.0	2 8.8 2 11.2	49.70 49.85	49.80 50.05	..... .....	310 1 21.30 49 57 50.50	+ 1.78 + 2.00	+ 0.17 - 0.18	-1 11.93 +1 11.96	+88 54 43.27
15	Groombridge 1418	W E	3 ...	8 22 8.0 8 27 32.0	4 28.8 0 55.2	49.30 49.85	49.40 50.00	..... .....	46 26 25.25 313 32 51.48	+ 1.33 + 1.94	- 3.41 + 0.14	+1 3.64 -1 3.64	+85 23 5.23
16	73 Draconis S. P.	E W	3 3.5	8 32 10.0 8 36 38.0	0 39.4 3 48.6	50.10 49.20	50.35 49.50	..... .....	293 35 20.65 66 23 44.48	+ 2.26 + 1.39	- 0.19 + 6.41	-2 17.80 +2 17.86	+74 38 10.55
17	ρ Ursæ Majoris	W E	3 ...	8 51 7.0 8 56 3.0	2 51.5 2 4.5	48.30 49.95	48.50 50.00	..... .....	29 3 39.38 330 55 38.38	+ 0.41 + 2.02	- 9.62 + 5.07	+ 33.68 - 33.69	+67 59 42.83
18	October 31, L. ρ Ursæ Majoris S. P.	W E	3.5 ...	20 51 34.0 20 56 35.0	2 24.5 2 36.5	48.65 49.95	49.80 50.95	..... .....	73 1 23.18 286 57 48.05	+ 1.34 + 2.61	+ 3.47 - 4.07	+3 11.40 -3 11.43	+67 59 41.10
19	γ Equulei	E W	3 ...	21 3 12.7 21 8 8.0	2 31.8 2 23.5	50.15 48.45	51.50 49.40	..... .....	29 9 29.20 330 49 42.60	+ 2.98 + 1.06	-19.77 +17.67	+ 32.98 - 32.98	+ 9 45 8.26

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
28 7 57	35.2	37.8	30.014						1	359 59 36.50	-33.94
8 9	35.2	...	...						2	36.44	...
8 21	36.0	...	...						3	35.78	+34.44
8 35	35.6	...	...						4	36.72	...
8 41	...	37.7	30.010						5	36.58	+31.70
8 54	35.9	...	...						6	36.59	...
29 19 46	53.2	...	...						7	36.28	...
19 52	...	54.9	29.954						8	36.08	...
20 2	52.3	...	...						9	35.54	+34.53
20 12	51.6	...	...						10	36.54	...
20 26	51.0	...	...						11	36.00	...
20 36	50.6	...	...						12	35.52	+31.78
20 44	50.6	...	...						13	38.12	-33.93
20 50	...	53.0	29.953						14	37.80	...
20 54	50.6	...	...						15	38.36	+34.58
30 7 51	32.5	35.0	30.098						16	37.48	...
8 26	32.0	...	...						17	37.82	+31.95
8 40	32.1	...	...						18	37.28	+32.01
8 54	31.7	34.6	30.109						19	36.87	-26.21
31 20 45	42.9	45.6	30.050								
20 55	42.6	...	...						
21 6	42.6	...	...						

Notes.
1. Very faint.
2 W. 4 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ε Capricorni	W E	3	21 14 20.0 21 19 12.0	2 38.4 2 13.6	47.70 50.35	48.60 51.60	..... .....	303 51 17.98 56 7 50.08	+ 0.24 + 3.15	+12.24 - 8.71	-1 27.89 +1 27.90	-17 14 18.14
2	γ Cygni	E W	2.5	21 31 .. ..	.. ..	49.75 49.45	51.05 50.40	26.018 26.018	0 47 15.00 359 10 18.15	+ 3.27 + 2.74	+ 0.26 - 0.26	+ 0.83 - 0.83	+38 6 47.00
3	λ Capricorni	W E	3	21 38 47.0 21 43 47.0	2 39.5 2 20.5	48.75 49.80	49.50 50.65	..... .....	309 17 7.32 50 42 1.62	+ 1.23 + 2.39	+13.65 -10.59	-1 12.19 +1 12.19	-11 48 11.02
4	ν Pegasi	E W	3	21 58 2.0 22 3 4.5	2 52.8 2 9.7	50.20 49.40	51.35 50.30	..... .....	34 18 45.85 325 40 33.00	+ 2.00 + 1.95	-22.40 +12.62	+ 40.38 - 40.38	+ 4 35 47.01
5	47 Aquarii	W E	3	22 13 41.0 22 18 47.0	2 42.0 2 24.0	48.55 49.80	49.50 50.80	..... .....	299 1 25.78 60 57 42.92	+ 1.15 + 2.46	+11.80 - 9.32	-1 46.34 +1 46.36	-22 4 28.24
6	κ Aquarii	E W	2.5	22 30 13.0 22 35 8.5	2 38.7 2 16.8	50.55 49.40	51.55 50.15	..... .....	43 37 11.22 316 22 1.62	+ 3.20 + 1.93	-15.44 +11.47	+ 56.43 - 56.43	- 4 43 1.63
7	τ Aquarii	W E	3	22 41 57.0 22 46 54.0	2 38.3 2 18.7	48.75 50.05	49.30 51.05	..... .....	306 59 46.88 52 59 20.88	+ 1.16 + 2.70	+12.91 - 9.91	-1 18.51 +1 18.52	-14 5 38.10
8	β Piscium	E W	3	22 56 42.0 23 1 37.0	2 22.3 2 32.7	50.75 49.40	51.80 50.00	..... .....	35 35 47.92 324 23 20.15	+ 3.46 + 1.83	-14.73 +16.97	+ 42.45 - 42.46	+ 3 18 35.48
9	φ Aquarii	W E	2.5	23 6 32.0 23 11 52.0	2 53.8 2 26.2	49.05 50.60	49.70 51.35	..... .....	314 31 24.05 45 27 41.28	+ 1.50 + 3.16	+17.86 -12.64	-1 0.26 +1 0.26	- 6 33 37.68
10	4 Cassiopeiae	W E	2.5	23 18 48.0 23 23 31.0	1 52.7 2 50.3	49.05 50.50	49.85 51.50	..... .....	22 49 51.98 337 9 7.92	+ 1.60 + 3.15	- 6.57 +14.99	+ 24.99 - 24.99	+61 45 52.24
11	248 G. Aquarii	E W	3	23 28 14.0 23 33 5.0	2 25.8 2 25.2	50.55 49.30	51.55 49.90	..... .....	46 53 23.50 313 5 46.98	+ 3.21 + 1.75	-12.23 +12.13	+1 3.36 -1 3.37	- 7 59 23.40
12	19 Piscium	W E	3	23 39 7.0 23 44 5.0	2 27.1 2 30.9	48.55 50.40	49.10 51.15	..... .....	324 2 26.98 35 56 46.32	+ 0.90 + 2.91	+15.62 -16.43	- 43.04 + 43.05	+ 2 57 39.08
13	November 1, L. 33 Cygni	W E	3	20 9 11.0 20 13 44.5	2 2.0 2 31.5	48.80 48.65	51.10 50.75	..... .....	17 21 11.28 342 37 49.52	+ 0.41 + 0.19	-11.75 +18.12	+ 17.81 - 17.83	+56 17 0.66
14	212 H ¹ . Draconis	E W	3.5	20 28 2.0 20 33 2.0	2 26.1 2 33.0	48.80 48.70	51.00 51.15	..... .....	326 42 24.50 33 16 44.85	+ 0.33 + 0.36	+ 5.04 - 5.59	- 37.51 + 37.55	+72 12 59.18
15	ε Cygni	W E	2.5	20 42 .. ..	.. ..	48.75 48.90	50.95 51.25	28.264 28.264	354 39 15.50 5 15 16.70	- 0.41 - 0.18	- 0.22 + 0.22	- 5.32 + 5.32	+33 37 10.52
16	76 Draconis	E W	3.5	20 47 30.0 20 51 52.0	2 6.2 2 15.8	48.90 48.80	51.00 51.00	..... .....	316 44 33.50 43 14 35.72	+ 0.38 + 0.34	+ 1.34 - 1.55	- 53.01 + 53.94	+82 11 10.35
17	σ ² Ursae Majoris s. p.	W E	4	20 59 18.0 21 4 54.0	2 43.9 2 52.1	48.85 49.05	51.10 51.00	..... .....	73 30 6.30 286 29 3.92	+ 0.38 + 0.49	+ 4.55 - 5.01	+3 11.27 -3 11.23	+ 67 30 56.06
18	212 H ¹ . Draconis s. p.	W E	3.5 3	8 27 8.0 8 31 32.0	3 20.2 1 3.8	49.45 49.85	50.25 50.55	..... .....	68 48 40.38 291 10 24.05	+ 0.46 + 0.81	+ 5.57 - 0.56	+2 31.40 -2 31.45	+72 13 0.74
19	α Mali	E W	3 3.5	8 37 14.0 8 42 2.0	2 34.1 2 13.9	50.00 49.90	51.20 50.60	..... .....	71 42 26.32 288 16 42.40	+ 1.22 + 0.88	- 8.91 + 6.73	+2 57.15 -2 57.17	-32 50 24.69
20	76 Draconis s. p.	W E	2.5	8 47 24.0 8 52 8.0	2 12.2 2 31.8	49.65 49.25	50.35 50.25	..... .....	58 51 27.90 301 7 42.20	+ 0.66 + 0.41	+ 1.18 - 1.55	+1 37.59 -1 37.59	+82 11 11.29

Time	Ther- 1904	Alt. ther	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904 0.
<i>d h m</i>			<i>in</i>						<i>° ' "</i>	<i>"</i>
11 21 15	42.6			Instrument in meridian, observation at I with movable thread.				1	189 59 37.50	
21 42	42.3			Instrument in meridian, observation at IX with movable thread.				2	16 87	-33.60
21 46	42.2	44.4	30.058					3	17 81	-19.48
22 17	41.7							4	36.90	-24.84
22 33	41.6							5	37.40	-16.14
22 45	41.5	41.6	30.060					6	37.00	-21.70
22 59	40.9							7	37.12	-18.70
23 9	39.72							8	37.80	-23.62
23 23	41.1							9	37.60	
23 31	40.6							10	36.54	
23 42	40.6	42.9	30.054					11	37.06	-19.83
23 52	39.5	60.7	29.994					12	18 16	-22.25
23 53	37.6							13	31.88	
23 55	36.0							14	34.76	
24 2	35.1	58.4	29.994	Note.				15	34.80	
5 26	41.9	45.9	30.126	1 E. Minute of clock time assumed				16	34.88	
8 49	41.6							17	35.14	
8 59	41.8							18	35.11	
								19	14 11	
								20	35.40	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
1	σ^2 Ursæ Majoris	E W	3 ...	$h\ m\ s$ 8 59 41.0 9 5 21.0	$m\ s$ 2 21.0 3 19.0	d 49.75 49.90	d 50.65 50.65	r	$^{\circ}\ ' \ ''$ 331 24 21.50 28 34 55.58	$''$ + 0.81 + 0.91	$''$ + 6.74 - 13.43	$' \ ''$ - 32.22 + 32.23	$^{\circ}\ ' \ ''$ + 67 30 56.01
2	November 2, L. κ Cephei	E W	3 2.5	20 9 44.0 20 15 2.0	2 25.0 2 53.0	48.85 49.40	50.15 51.20	..... .....	321 29 37.65 38 29 31.60	+ 0.84 + 1.65	+ 3.12 - 4.44	- 46.09 + 46.09	+ 77 25 56.47
3	212 H ¹ . Draconis	W E	3 ...	20 28 10.0 20 33 6.0	2 18.2 2 37.8	49.00 48.20	50.40 49.95	..... .....	33 16 43.42 326 42 25.08	+ 1.00 + 0.35	- 4.51 + 5.88	+ 38.05 - 38.05	+ 72 12 59.13
4	ϵ Cygni	E W	..... .....	20 42 ..... .....	..... .....	48.25 49.00	50.05 50.55	25.176 25.176	5 17 21.08 354 41 21.48	+ 1.20 + 1.84	+ 0.22 - 0.22	+ 5.38 - 5.38	+ 33 37 11.25
5	76 Draconis	W E	2.5	20 47 16.0 20 51 42.0	2 20.1 2 5.9	49.00 48.45	50.45 50.00	..... .....	43 14 35.08 310 44 34.62	+ 1.03 + 0.51	- 1.66 + 1.34	+ 54.54 - 54.55	+ 82 11 10.76
6	σ^2 Ursæ Majoris S. P.	E W	3.5 3	20 59 58.0 21 4 16.0	2 4.0 2 14.0	48.40 49.30	50.20 50.90	..... .....	286 29 4.25 73 30 2.58	+ 0.61 + 1.47	- 2.60 + 3.04	- 3 13.59 + 3 13.61	+ 67 30 57.20
7	ϵ Aquarii	E W	3	21 59 4.0 22 4 4.0	2 15.9 2 44.1	49.60 49.45	51.30 50.75	..... .....	53 13 30.88 306 45 32.88	+ 1.81 + 1.46	- 9.48 + 13.82	+ 17.84 - 17.84	- 14 19 48.58
8	θ Aquarii	W E	3	22 9 9.0 22 14 2.0	2 41.9 2 11.1	48.65 49.40	50.00 50.95	..... .....	312 49 46.32 47 9 17.55	+ 0.67 + 1.52	+ 15.01 - 9.84	- 1 2.76 + 1 2.76	- 8 15 19.60
9	η Aquarii	W E	2.5	22 27 49.0 22 33 41.0	2 41.3 3 10.7	48.50 49.05	49.90 51.45	..... .....	320 28 27.95 39 30 48.72	+ 0.48 + 1.88	+ 17.35 - 24.24	- 48.03 + 48.05	- 0 36 21.55
10	τ Aquarii	E W	3	22 42 1.0 22 46 53.0	2 34.5 2 17.5	50.55 49.60	52.00 50.95	..... .....	52 59 23.15 306 59 45.55	+ 2.64 + 1.65	- 12.30 + 9.74	+ 17.27 - 17.29	- 14 5 38.78
11	α Pegasi	W E	3	22 57 18.0 23 2 24.5	2 45.8 2 20.7	48.50 49.40	49.80 51.15	..... .....	335 46 3.55 24 12 59.68	+ 0.50 + 1.60	+ 27.50 - 19.81	- 26.24 + 26.24	+ 14 41 45.58
12	ϕ Aquarii	E W	3	23 7 11.0 23 11 50.5	2 15.1 2 24.4	49.75 49.30	51.70 50.55	..... .....	45 27 40.15 314 31 26.00	+ 2.09 + 1.27	- 10.79 + 12.33	+ 59.27 - 59.28	- 6 33 38.42
13	ν Pegasi	W E	2.5	23 18 10.6 23 23 6.0	2 30.0 2 25.4	48.70 49.75	49.60 51.30	..... .....	343 57 4.85 16 2 5.95	+ 0.47 + 1.90	+ 31.83 - 29.92	- 16.79 + 16.79	+ 22 52 59.60
14	λ Andromedæ	E W	3	23 33 ..... .....	..... .....	49.95 49.40	51.50 50.35	26.210 26.210	352 57 13.92 7 0 1.70	+ 2.80 + 1.98	+ 0.35 - 0.35	- 7.20 + 7.20	+ 45 56 47.11
15	19 Piscium	E W	3	23 39 2.0 23 44 11.5	2 32.4 2 37.1	49.80 48.95	51.30 50.00	..... .....	35 56 47.58 324 2 20.98	+ 1.88 + 0.77	- 16.76 + 17.81	+ 42.36 - 42.37	+ 2 57 37.84
16	November 5, L. κ Cephei S. P.	W E	3.5	8 11 24.0 8 16 16.0	0 45.2 4 6.8	47.25 46.85	48.55 48.25	..... .....	63 36 25.50 296 22 55.00	+ 0.78 + 0.44	+ 0.21 - 6.27	+ 1 56.54 - 1 56.55	+ 77 25 58.03
17	212 H ¹ . Draconis S. P.	E W	3	8 26 8.0 8 38 18.0	4 20.4 7 49.6	46.60 48.40	47.85 49.65	..... .....	291 10 31.95 68 48 20.02	+ 0.10 + 1.93	- 9.42 + 30.62	- 2 28.86 + 2 28.97	+ 72 12 59.35
18	November 6, L. α Mali	W E	4	8 37 20.0 8 42 9.0	2 28.7 2 20.3	48.40 48.40	49.55 49.60	..... .....	288 16 41.88 71 42 28.52	+ 0.61 + 0.62	+ 8.30 - 7.39	- 2 57.40 + 2 57.34	- 32 50 26.08
19	76 Draconis S. P.	E W	3.5 3	8 47 4.0 8 52 20.0	2 31.8 2 44.2	48.50 50.00	49.45 50.55	..... .....	301 7 43.15 58 51 27.42	+ 0.63 + 1.96	- 1.55 + 1.82	- 1 37.65 + 1 37.65	+ 82 11 11.09

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
$d\ h\ m$	$^{\circ}$	$^{\circ}$	$in.$							$^{\circ}\ ' \ ''$	$''$
1 9 3	43.6	45.4	30.131	4-14. Instrument in meridian, observation at I with movable thread.					1	359 59 36.06	.....
2 20 13	52.8	54.7	30.103						2	35.21	.....
20 31	52.7	.....	.....						3	35.61	.....
20 40	52.6	.....	.....						4	36.15	.....
20 50	52.3	.....	.....						5	35.90	.....
21 2	52.1	54.2	30.101						6	34.68	.....
22 2	50.3	53.3	30.098						7	35.68	.....
22 12	50.3	.....	.....						8	35.62	.....
22 31	50.3	.....	.....						9	36.08	.....
22 45	49.6	.....	.....						10	35.20	- 18.50
23 0	49.8	52.1	30.093						11	36.51	.....
23 10	49.3	.....	.....						12	35.52	.....
23 21	49.2	.....	.....						13	37.54	.....
23 42	48.6	50.8	30.086						14	35.33	.....
5 8 15	42.2	43.9	29.501	Notes. 3.5, 6. ro. Paint. 11 E. Minute of clock time assumed. 17. Clouds.					15	36.12	- 22.17
8 29	42.0	.....	.....						16	37.82	.....
8 42	41.5	43.4	29.510						17	37.66	.....
6 8 40	36.2	36.8	29.676						18	36.24	.....
8 50	36.6	.....	.....						19	36.72	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	σ^2 Ursæ Majoris	W E	3 ...	8 59 25.0 9 4 13.0	2 37.8 2 10.2	49.60 48.75	50.35 49.40	..... .....	28 34 49.95 331 24 24.48	+ 1.64 + 0.70	- 8.44 + 5.75	+ 32.26 - 32.26	+67 30 55.14
2	η B. Cephei S. P.	E W	3 ...	9 8 14.0 9 12 56.0	0 44.4 5 26.4	48.90 50.25	49.50 50.90	..... .....	296 41 41.82 63 17 19.30	+ 0.86 + 2.25	- 0.20 +10.72	-1 57.26 +1 57.27	+77 44 51.07
3	γ H. Draconis	W E	3 ...	9 18 56.0 9 22 55.0	4 36.0 0 37.0	50.10 48.75	50.60 49.45	..... .....	42 47 59.45 317 11 18.88	+ 2.05 + 0.75	- 6.82 + 0.12	+ 54.83 - 54.82	+81 44 29.06
4	β Cephei S. P.	E W	4 ...	9 26 32.0 9 30 50.0	0 58.2 3 19.8	48.60 50.15	49.45 50.95	..... .....	289 6 40.80 70 52 24.32	+ 0.66 + 2.21	- 0.52 + 6.09	-2 49.34 +2 49.36	+70 8 58.04
5	November 7, L. σ^2 Ursæ Majoris S. P.	E W	3.5 ...	20 58 12.0 21 2 14.0	3 51.0 0 11.0	48.75 49.50	50.65 51.25	..... .....	286 29 12.28 73 30 7.35	+ 0.92 + 1.58	- 9.03 + 0.02	-3 13.69 +3 13.75	+67 30 57.12
6	η B. Cephei	W E	2.5 ...	21 6 17.0 21 10 16.0	1 12.7 2 46.3	49.45 48.95	51.05 50.80	..... .....	38 48 22.18 321 10 43.80	+ 1.47 + 1.10	- 0.76 + 3.97	+ 46.71 - 46.73	+77 44 50.50
7	γ H. Draconis S. P.	E W	3.5 ...	21 18 40.0 21 23 36.0	4 52.2 0 3.8	49.05 49.95	50.85 51.50	..... .....	300 41 5.00 59 18 9.80	+ 1.18 + 1.95	- 6.04 0.00	-1 37.66 +1 37.70	+81 44 29.75
8	β Cephei	W E	3 ...	21 27 24.0 21 31 13.0	0 6.3 3 42.7	49.55 48.75	51.35 50.60	..... .....	31 12 41.22 328 46 15.80	+ 1.68 + 0.88	- 0.01 +13.78	+ 35.24 - 35.26	+70 8 58.23
9	λ Capricorni	E W	3 ...	21 38 56.0 21 43 56.0	2 31.2 2 28.8	49.05 49.85	50.90 51.50	..... .....	50 42 5.80 309 17 4.20	+ 1.23 + 1.93	-12.27 +11.88	+1 11.06 -1 11.07	-11 48 12.67
10	ϵ Pegasi	W E	3 ...	22 0 6.5 22 4 46.0	2 31.2 2 8.3	48.15 49.20	49.85 51.20	..... .....	345 57 2.68 14 1 59.52	+ 0.21 + 1.46	+36.27 -26.12	- 14.57 + 14.57	+24 53 4.35
11	γ Aquarii	E W	2.5 ...	22 13 52.5 22 18 53.0	2 54.6 2 5.9	49.90 49.30	51.65 51.05	..... .....	40 46 14.25 319 13 4.42	+ 2.00 + 1.41	-19.79 +10.29	+ 50.23 - 50.25	- 1 51 53.64
12	η Aquarii	E W	2.5 ...	22 28 1.5 22 32 32.0	2 29.2 2 1.3	49.80 49.50	51.60 51.00	..... .....	39 30 40.78 320 28 33.88	+ 1.94 + 1.47	-14.85 + 9.81	+ 48.05 - 48.06	- 0 36 22.64
13	λ Pegasi	W E	2.5 ...	22 39 22.0 22 44 18.6	2 37.9 2 18.7	48.50 49.85	50.15 51.75	..... .....	344 8 6.95 15 50 55.58	+ 0.56 + 2.04	+35.62 -27.49	- 16.57 + 16.57	+23 4 6.70
14	β Andromedæ	E W	2.5 ...	22 57 4.5 23 2 13.5	2 53.8 2 15.2	50.55 49.55	52.30 50.95	..... .....	349 21 54.48 10 36 55.52	+ 2.71 + 1.48	+45.11 -27.32	- 10.96 + 10.96	+49 32 21.42
15	ϕ^1 Aquarii	W E	3 ...	23 8 14.0 23 13 16.0	2 43.2 2 18.8	49.25 50.10	50.80 52.00	..... .....	311 28 50.20 48 30 15.35	+ 1.25 + 2.29	+14.87 -10.76	-1 5.98 +1 6.01	- 9 36 19.51
16	ν Pegasi	E W	2.5 ...	23 18 9.3 23 22 52.5	2 31.7 2 11.5	50.10 49.75	51.95 51.25	..... .....	16 2 7.20 343 57 9.78	+ 2.30 + 1.74	-32.56 +24.47	+ 16.82 - 16.82	+22 52 59.47
17	λ Andromedæ	W E	3 ...	23 33 ..... .....	..... .....	49.15 49.70	50.65 51.90	27.573 27.573	6 59 9.55 352 56 20.72	+ 0.40 + 1.30	- 0.35 + 0.35	+ 7.21 - 7.21	+45 56 47.59
18	ϕ Andromedæ	E W	3 ...	23 41 ..... .....	..... .....	50.40 49.65	52.10 51.10	25.987 25.987	353 0 27.40 6 57 8.20	+ 3.22 + 2.35	+ 0.35 - 0.35	- 7.16 + 7.16	+45 53 43.55
19	ϕ Pegasi	W E	3 ...	23 50 18.0 23 55 15.7	2 41.0 2 16.7	49.20 50.45	50.60 52.20	..... .....	345 40 49.25 14 18 10.60	+ 1.13 + 2.62	+40.46 -29.17	- 14.95 + 14.95	+24 36 55.21
20	β Andromedæ	E W	2.5 ...	0 5 ..... .....	..... .....	50.70 50.00	52.25 51.30	26.085 26.085	353 21 21.05 6 36 5.98	+ 3.47 + 2.65	+ 0.35 - 0.35	- 6.81 + 6.81	+45 32 45.29

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>	<i>° ' "</i>	<i>° ' "</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
9 3	16.0	...	...	17	Instrument in meridian, observation at IX with movable thread.				1	359 59 37.04
9 16	35.9	...	...	18, 20	Instrument in meridian, observation at I with movable thread.				2	37.18
9 22	16.1	...	...						3	37.22
9 34	16.9	37.7	29.694						4	36.79
9 56	46.2	47.3	29.692						5	36.59
10 11	46.0	...	...						6	36.87
10 17	44.7	...	...						7	35.06
10 18	44.1	...	...						8	36.66
10 42	44.0	46.0	29.694						9	36.18
10 51	41.8	...	...						10	37.01
10 57	11.6	...	...						11	36.28
10 58	41.5	...	...						12	36.51
10 59	41.3	45.1	29.694						13	36.63
11 0	42.6	...	...						14	35.99
11 11	42.1	...	...						15	36.62
11 21	41.9	41.9	29.690						16	36.46
11 45	41.5	...	...						17	36.28
11 51	41.2	41.7	29.691						18	36.60
12 9	40.9	...	...						19	37.44
									20	36.60

Notes.
9. Very faint.
10. Clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>d</i> Piscium	W E	2.5 ...	0 13 7.5 0 17 50.0	2 37.8 2 4.7	49.20 50.10	50.60 51.90	..... .....	328 44 22.38 31 14 40.98	+ 1.12 + 2.25	+20.18 -12.61	- 35.56 + 35.55	+ 7 39 47.75
2	<i>κ</i> Cassiopeiae	E W	2 ...	0 25 10.0 0 29 51.0	2 30.6 2 10.4	50.70 50.00	52.20 51.45	..... .....	336 30 30.50 23 28 33.92	+ 2.70 + 1.95	+11.18 - 8.38	- 25.46 + 25.46	+62 24 33.79
3	73 G. Ceti	W E	3.5 ...	0 37 25.0 0 42 30.0	2 40.0 2 25.0	49.45 50.65	50.85 52.30	..... .....	298 34 7.02 61 25 0.22	+ 1.41 + 2.74	+11.42 - 9.38	-1 47.28 +1 47.30	-22 31 47.39
4	<i>μ</i> Andromedæ	E W	2 ...	0 51 ..... .....	..... .....	50.65 50.00	52.50 51.45	25.757 25.757	0 55 5.18 359 2 49.25	+ 3.57 + 2.69	+ 0.26 - 0.26	+ 0.96 - 0.96	+37 59 7.15
5	November 11, L. <i>γ</i> Equulei	W E	3 ...	21 3 4.5 21 7 55.5	2 40.9 2 10.1	49.40 50.05	49.45 50.20	..... .....	330 49 35.30 29 9 24.80	+ 0.59 + 1.31	+22.21 -14.53	- 32.86 + 32.88	+ 9 45 7.15
6	<i>ε</i> Capricorni	E W	3 ...	21 14 21.0 21 18 51.0	2 38.4 1 51.6	50.50 50.30	50.65 50.45	..... .....	56 7 52.70 303 51 19.32	+ 1.77 + 1.55	-12.24 + 6.08	+1 27.67 -1 27.70	-17 14 18.56
7	<i>ρ</i> Cygni	W E	3 ...	21 30 ..... .....	..... .....	49.65 49.95	49.50 50.25	28.650 28.650	6 12 15.95 353 41 46.28	- 0.01 + 0.55	- 0.34 + 0.34	+ 6.47 - 6.47	+45 10 37.44
8	<i>ν</i> Cephei	E W	3 ...	21 40 2.0 21 45 15.0	2 44.0 2 29.0	50.55 50.25	50.65 50.30	..... .....	338 13 42.52 21 45 21.88	+ 1.79 + 1.46	+15.07 -12.44	- 23.59 + 23.59	+60 41 16.11
9	<i>η</i> Piscis Australis	W E	3 ...	21 52 44.0 21 57 43.0	2 40.9 2 18.1	49.85 50.35	49.60 50.50	..... .....	292 11 52.52 67 47 11.95	+ 0.91 + 1.60	+10.38 - 7.65	-2 23.86 +2 23.90	-28 54 38.16
10	28 Pegasi	E W	2 ...	22 3 29.8 22 8 14.5	2 33.5 2 11.2	50.25 50.45	50.50 50.25	..... .....	18 24 8.85 341 35 6.78	+ 1.57 + 1.53	-29.65 +21.66	+ 19.69 - 19.71	+20 30 51.66
11	31 Pegasi	W E	2 ...	22 14 14.0 22 19 24.5	2 39.1 2 31.4	49.90 50.10	49.75 50.20	..... .....	332 48 9.55 27 10 56.38	+ 0.97 + 1.32	+23.01 -20.84	- 30.41 + 30.42	+11 43 44.68
12	<i>λ</i> Pegasi	E W	2 ...	22 39 17.5 22 44 20.5	2 42.6 2 20.4	51.40 50.80	51.15 50.45	..... .....	15 51 2.20 344 8 12.05	+ 2.47 + 1.83	-37.77 +28.17	+ 16.85 - 16.85	+23 4 7.48
13	3 Andromedæ	W E	2 ...	22 57 24.7 23 2 4.3	2 33.8 2 5.8	49.65 49.95	49.45 49.90	..... .....	10 37 3.48 349 22 16.10	+ 0.71 + 1.08	-35.33 +23.65	+ 11.13 - 11.13	+49 32 21.90
14	<i>φ</i> ¹ Aquarii	E W	3 ...	23 8 39.0 23 13 10.0	2 18.5 2 12.5	50.95 50.50	50.95 50.20	..... .....	48 30 12.38 311 28 54.72	+ 2.12 + 1.53	-10.71 + 9.80	+1 7.04 -1 7.05	- 9 36 19.16
15	<i>κ</i> Piscium	W E	3 ...	23 19 29.0 23 24 34.5	2 37.5 2 28.0	49.40 51.10	48.90 50.80	..... .....	321 48 57.85 38 10 7.82	+ 0.31 + 2.13	+17.03 -15.04	- 46.70 + 46.72	+ 0 44 10.19
16	<i>ε</i> Andromedæ	E W	2.5 ...	23 33 ..... .....	..... .....	51.40 50.50	51.35 49.90	26.330 26.330	356 9 9.18 3 47 54.88	+ 3.31 + 2.13	+ 0.31 - 0.31	- 3.98 + 3.97	+42 44 42.68
17	25 Piscium	W E	3 ...	23 45 30.5 23 50 26.5	2 45.2 2 10.8	49.05 50.95	48.50 50.75	..... .....	322 38 31.05 37 20 31.05	- 0.09 + 2.03	+19.06 -11.98	- 45.39 + 45.40	+ 1 33 45.82
18	22 Andromedæ	W E	3 ...	0 5 ..... .....	..... .....	50.25 51.20	49.65 50.95	27.213 27.213	6 35 23.68 353 20 35.12	+ 0.55 + 1.08	- 0.22 + 0.22	+ 6.92 - 6.92	+45 32 47.17
19	<i>d</i> Piscium	E W	3.5 3	0 13 4.0 0 18 1.5	2 41.6 2 15.9	51.95 50.30	51.45 49.55	..... .....	31 14 46.32 328 44 26.70	+ 2.92 + 1.09	-21.17 +14.97	+ 36.17 - 36.17	+ 7 39 47.94
20	49 G. Ceti	W E	3.5 ...	0 23 7.0 0 28 0.0	2 33.6 2 19.4	49.85 51.55	49.00 51.15	..... .....	296 47 11.02 63 11 53.90	+ 0.59 + 2.57	+10.22 - 8.42	-1 57.60 +1 57.62	-24 18 53.96

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
7 0 16	41.1	.....	.....	4. 16. Instrument in meridian, observation at I with movable thread.							1	359 59 37.14	-21.54
0 28	40.9	.....	.....	7. Instrument in meridian, observation at IX with movable thread.							2	35.94	-27.57
0 40	40.7	.....	.....	18. Instrument in meridian, observation at VIII with movable thread.							3	36.72	-13.59
0 55	40.6	42.7	29.698								4	36.98	.....
11 21 6	41.7	43.1	29.894								5	34.85	-25.75
21 18	41.2	.....	.....								6	34.58	.....
21 28	40.9	.....	.....								7	36.16	-35.24
21 43	40.3	.....	.....								8	35.24	-37.34
21 55	40.2	42.1	29.897								9	34.88	-12.75
22 6	39.6	.....	.....								10	35.36	-29.36
22 17	39.4	.....	.....								11	35.20	-26.62
22 42	38.7	40.2	29.900								12	34.48	.....
23 0	38.6	.....	.....								13	34.84	-34.13
23 11	38.2	.....	.....								14	34.92	-18.90
23 22	37.8	.....	.....								15	35.06	.....
23 32	37.3	.....	.....								16	34.78	.....
23 49	37.0	38.7	29.902								17	35.58	-21.21
0 3	36.4	.....	.....								18	36.60	.....
0 16	36.3	.....	.....								19	35.42	-21.57
0 31	36.0	.....	.....								20	34.95	-12.95

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	73 G. Ceti	E	3.5	0 37 22.0	2 43.3	52.20	51.70	.....	61 25 0.05	+ 3.17	-11.90	+1 49.19	-22 31 48.09
		W	...	0 42 28.0	2 22.7	50.45	49.45	.....	298 34 9.78	+ 1.15	+ 9.09	-1 49.21	
2	μ Andromedæ	W	2.5	0 51 .....	.....	49.65	49.00	28.248	359 1 11.28	- 0.24	- 0.26	- 0.97	+37 59 8.53
		E	...	.....	.....	51.15	50.75	28.248	0 53 23.62	+ 1.42	+ 0.26	+ 0.97	
3	November 14, L. α Cygni	E	2.5	20 38 .....	.....	51.05	51.15	25.867	353 57 27.48	+ 2.40	+ 0.34	- 6.20	+44 56 47.04
		W	...	.....	.....	50.15	49.95	25.867	6 0 17.40	+ 1.31	- 0.34	+ 6.20	
4	220 H ¹ . Draconis	W	2.5	20 40 46.0	2 11.8	50.00	49.50	.....	41 15 37.90	+ 0.29	- 1.00	+ 51.52	+80 12 10.07
		E	...	20 54 20.0	2 22.2	50.75	50.75	.....	318 43 29.22	+ 1.31	+ 2.21	- 51.55	
5	98 B. Cephei	E	2	21 5 10.0	2 17.5	50.55	50.90	.....	321 10 43.12	+ 1.26	+ 2.72	- 47.32	+77 44 51.44
		W	...	21 9 31.0	2 3.5	50.00	49.95	.....	38 48 23.50	+ 0.50	- 2.19	+ 47.34	
6	B. A. C. 7504	W	2	21 18 24.0	0 23.1	49.95	49.85	.....	47 42 16.38	+ 0.42	- 0.02	+1 4.67	+86 39 3.79
		E	...	21 22 10.0	3 22.9	50.60	50.65	.....	312 16 49.55	+ 1.17	+ 1.38	-1 4.71	
7	β Cephei	E	3	21 27 2.0	0 26.4	50.65	50.80	.....	328 46 26.25	+ 1.26	+ 0.19	- 35.69	+70 8 59.58
		W	...	21 32 34.0	5 5.6	49.90	49.80	.....	31 13 7.50	+ 0.38	-25.94	+ 35.72	
8	109 B. Ursæ Majoris s. p.	E	3	21 47 21.0	2 31.2	50.45	50.60	.....	292 16 51.00	+ 1.07	- 3.01	-2 22.97	+73 19 35.02
		W	...	21 51 51.0	1 58.8	49.55	49.50	.....	67 42 17.65	+ 0.04	+ 1.85	+2 22.98	
9	16 Cephei	W	3	21 56 12.0	1 44.9	49.80	49.55	.....	33 47 42.05	+ 0.22	- 2.49	+ 39.47	+72 44 1.24
		E	...	22 0 17.0	2 20.1	50.35	50.45	.....	326 11 24.38	+ 0.95	+ 4.44	- 39.48	
10	November 16, L. α Cygni	W	3	20 38 .....	.....	48.65	49.45	27.437	5 59 14.98	+ 0.08	- 0.34	+ 6.09	+44 56 47.16
		E	...	.....	.....	49.45	50.35	27.437	353 56 24.82	+ 0.92	+ 0.34	- 6.09	
11	220 H ¹ . Draconis	E	2	20 49 32.0	2 25.8	49.80	50.50	.....	318 43 29.92	+ 1.94	+ 2.32	- 50.65	+80 12 9.39
		W	...	20 54 26.0	2 28.2	49.35	49.60	.....	41 15 39.30	+ 1.25	- 2.40	+ 50.60	
12	ζ Cygni	W	3	21 9 .....	.....	48.60	49.50	27.532	350 53 10.50	+ 0.07	- 0.19	- 9.24	+29 50 30.35
		E	...	.....	.....	49.50	50.55	27.532	9 2 23.48	+ 1.04	+ 0.19	+ 9.24	
13	B. A. C. 7504	E	2.5	21 16 36.0	2 10.6	49.65	50.65	.....	312 16 49.65	+ 1.92	+ 0.57	-1 3.43	+86 39 3.57
		W	...	21 21 22.0	2 35.4	49.20	49.65	.....	47 42 18.52	+ 1.17	- 0.81	+1 3.46	
14	ρ Cygni	E	...	21 30 .....	.....	49.65	50.30	24.520	353 44 32.80	+ 2.46	+ 0.34	- 6.34	+45 10 36.94
		W	...	.....	.....	48.90	49.45	.....	6 14 48.10	+ 1.66	- 0.34	+ 6.34	
15	π Cephei	W	2.5	21 38 12.0	2 22.6	48.55	49.05	.....	31 56 34.85	+ 0.54	- 5.34	+ 36.12	+70 52 46.85
		E	...	21 43 2.0	2 27.4	49.35	50.05	.....	328 2 34.95	+ 1.45	+ 5.70	- 36.14	
16	γ Piscis Australis	E	2.5	21 52 48.0	2 35.4	50.20	50.95	.....	67 47 17.88	+ 2.37	- 9.68	+2 21.10	-28 54 38.71
		W	...	21 57 44.0	2 20.6	49.20	49.75	.....	292 11 52.88	+ 1.27	+ 7.93	-2 21.24	
17	28 Pegasi	W	2.5	22 3 18.5	2 43.4	48.35	48.90	.....	341 34 56.15	+ 0.36	+33.60	- 19.33	+20 30 51.38
		E	...	22 8 8.5	2 6.6	49.80	50.35	.....	18 24 0.48	+ 1.88	-20.17	+ 19.33	
18	31 Pegasi	E	3	22 14 19.0	2 32.6	50.00	51.05	.....	27 10 58.12	+ 2.30	-21.17	+ 29.86	+11 43 43.71
		W	...	22 19 9.0	2 17.4	49.00	49.50	.....	332 48 14.70	+ 1.04	+17.17	- 29.87	
19	7 Lacertæ	W	2.5	22 25 7.5	2 17.0	48.50	49.05	.....	10 52 29.62	+ 0.51	-27.25	+ 11.17	+49 47 55.28
		E	...	22 29 20.7	2 2.2	49.75	50.50	.....	349 6 44.60	+ 1.88	+21.68	- 11.17	
20	67 Aquarii	E	2.5	22 35 57.0	2 20.6	50.10	50.80	.....	46 21 36.22	+ 2.25	-11.49	+1 0.94	- 7 27 35.74
		W	...	22 41 21.0	3 3.4	48.85	49.40	.....	313 37 23.48	+ 0.88	+19.55	-1 0.97	

Time	Ther- 1892	At- ther	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904 0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>mm</i>			<i>° ' "</i>	<i>"</i>
11 0 11	17.7	17.1	29.901	2, 10, 12 Instrument in meridian, observation at IX with movable thread	1	359 59 35.06	-13.07
11 0 11	17.8	17.1	29.901	Instrument in meridian, observation at I with movable thread	2	36 40	
14 29 15	41.0	42.1	29.902	Instrument in meridian, E observation at I with movable thread, W. observation at I with fixed thread.	3	35 42	
20 52	40.9	...	...		4	34 50	
21 8	40.2	...	...		5	34 46	
21 25	39.9	...	...		6	34 42	
21 45	39.9	...	...		7	34 34	
21 41	39.6	...	...		8	34 40	
21 50	39.7	...	...		9	34 77	-18.07
22 1	39.6	49.7	29.905		10	35 03	
22 12	41.0	45.2	29.910		11	36 17	
22 52	51.2	...	...		12	36 06	
23 7	51.5	...	...		13	35 52	
23 20	51.1	...	...		14	35 57	-15.09
23 31	51.2	...	...		15	36 06	
23 50	51.1	51.3	29.940		16	36 10	-12.32
23 6	51.2	...	...		17	36 15	-29.16
23 12	50.5	...	...		18	36 08	-26.37
23 27	51.3	...	...		19	35 52	
23 39	50.7	52.0	29.978		20	35 43	-19.68

Note.
High wind

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	94 H ¹ . Aquarii	W E	2.5 ...	22 48 36.0 22 52 13.0	1 40.4 1 56.6	48.35 49.70	48.90 50.60	..... .....	315 35 32.65 44 23 39.82	+ 0.38 + 1.94	+ 6.08 - 8.21	- 56.94 + 56.94	- 5 29 37.41
2	A Piscium	E W	3 ...	23 1 6.0 23 6 5.0	2 44.2 2 14.8	50.35 48.70	51.20 49.20	..... .....	37 17 42.70 322 41 30.82	+ 2.59 + 0.72	- 18.87 + 12.72	+ 44.31 - 44.32	+ 1 36 41.35
3	10 Andromedæ	W E	3 ...	23 15 ..... .....	..... .....	48.45 50.10	48.70 50.75	29.147 29.147	2 35 4.30 357 18 17.12	- 0.42 + 1.46	- 0.30 + 0.30	+ 2.69 - 2.69	+ 41 33 41.79
4	κ Piscium	E W	3 ...	23 19 37.0 23 24 26.0	2 28.1 2 20.9	50.25 48.90	50.85 49.20	..... .....	38 10 9.90 321 48 59.32	+ 2.31 + 0.80	- 15.06 + 13.63	+ 45.78 - 45.79	+ 0 44 9.27
5	ι Andromedæ	W E	3.5 ...	23 33 ..... .....	..... .....	48.20 50.00	48.40 50.45	27.587 27.587	3 47 8.60 356 8 20.65	- 0.69 + 1.25	- 0.31 + 0.31	+ 3.90 - 3.90	+ 42 44 43.35
6	220 H ¹ . Draconis S. P.	E W	2.5 3	8 49 31.0 8 54 43.0	2 26.9 2 45.1	50.05 49.95	50.15 49.90	..... .....	299 8 49.80 60 50 17.12	+ 1.15 + 0.96	- 1.78 + 2.25	- 1 47.74 + 1 47.78	+ 80 12 9.91
7	98 B. Cephei S. P.	W E	3 ...	9 4 48.0 9 9 31.0	2 39.6 2 3.4	49.75 49.95	49.40 49.80	..... .....	63 17 23.02 296 41 45.32	+ 0.63 + 0.95	+ 2.57 - 1.53	+ 1 59.55 - 1 59.60	+ 77 44 52.93
8	B. A. C. 7504 S. P.	E W	3 ...	9 15 35.0 9 20 6.0	3 11.5 1 19.5	49.95 49.95	50.00 49.90	..... .....	305 35 21.05 54 23 49.28	+ 1.04 + 1.00	- 1.12 + 0.19	- 1 24.24 + 1 24.26	+ 86 39 4.25
9	β Cephei S. P.	W E	3 ...	9 24 28.0 9 29 42.0	3 0.7 2 13.3	49.75 49.75	49.55 49.50	..... .....	70 52 20.18 289 6 46.02	+ 0.68 + 0.66	+ 4.98 - 2.71	+ 2 52.93 - 2 53.04	+ 70 8 59.33
10	11 Cephei S. P.	E W	3 ...	9 37 36.0 9 42 24.0	2 58.6 1 49.4	49.05 50.00	48.95 49.95	..... .....	289 50 31.05 70 8 40.05	+ 0.02 + 1.02	- 4.71 + 1.77	- 2 46.43 + 2 46.48	+ 70 52 48.53
11	109 B. Ursæ Majoris	W E	2.5 2	9 46 44.0 9 51 47.0	3 8.9 1 54.1	49.75 49.95	49.85 49.95	..... .....	34 23 19.30 325 35 56.35	+ 0.86 + 0.12	- 7.60 + 2.80	+ 41.44 - 41.45	+ 73 19 34.79
12	16 Cephei S. P.	E W	3 ...	9 56 2.0 10 0 22.0	1 55.1 2 24.9	49.30 49.85	49.55 50.00	..... .....	291 41 25.75 68 17 41.28	+ 0.48 + 0.99	- 1.79 + 2.84	- 2 31.25 + 2 31.28	+ 72 44 1.65
13	24 Cephei S. P.	W E	3 ...	10 5 28.0 10 10 27.0	2 34.3 2 24.7	49.80 49.75	49.95 49.95	..... .....	69 8 50.28 290 50 16.32	+ 0.93 + 0.94	+ 3.37 - 2.96	+ 2 38.05 - 2 38.07	+ 71 52 45.05
14	30 H. Ursæ Majoris	E W	2.5 ...	10 15 12.0 10 19 27.0	2 4.6 2 10.4	49.70 49.85	49.90 49.95	..... .....	332 52 43.92 27 6 25.20	+ 0.84 + 0.93	+ 5.87 - 6.43	- 31.03 + 31.02	+ 66 2 32.31
15	November 17, L. 1 Pegasi	W E	3 ...	21 15 13.8 21 19 52.7	2 28.7 2 10.2	49.45 49.45	49.70 49.70	..... .....	340 28 18.55 19 30 44.68	+ 0.49 + 0.50	+ 26.48 - 20.30	- 21.17 + 21.20	+ 19 24 5.89
16	358 B. Cygni	E W	2.5 ...	21 25 51.5 21 30 42.5	2 26.0 2 25.0	49.65 50.40	49.95 50.40	..... .....	346 42 21.15 13 16 47.80	+ 0.73 + 1.35	+ 24.12 - 23.80	- 14.13 + 14.14	+ 52 12 20.56
17	ν Cephei	W E	2.5 ...	21 40 8.0 21 45 6.0	2 36.4 2 21.6	49.50 49.25	49.55 49.40	..... .....	21 45 23.70 338 13 48.98	+ 0.47 + 0.27	- 13.71 + 11.24	+ 23.92 - 23.93	+ 60 41 15.66
18	20 Pegasi	E W	2.5 ...	21 54 6.7 21 58 42.0	2 22.0 2 13.3	49.70 50.00	50.20 50.05	..... .....	26 14 37.52 333 44 33.10	+ 0.88 + 0.96	- 18.87 + 16.63	+ 29.57 - 29.59	+ 12 40 2.75
19	24 Cephei	W E	2.5 ...	22 5 22.0 22 10 31.0	2 40.3 2 28.7	49.40 49.40	49.60 49.95	..... .....	32 56 28.25 327 2 41.72	+ 0.42 + 0.61	- 6.23 + 5.36	+ 38.90 - 38.92	+ 71 52 43.93
20	2 Lacertæ	E W	3 ...	22 17 ..... .....	..... .....	49.80 50.50	50.65 50.60	24.984 24.984	352 51 5.68 7 7 48.32	+ 1.47 + 2.25	+ 0.06 - 0.35	- 7.53 + 7.53	+ 46 3 45.79

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
16 22 58	50.6	.....	.....	3.5. Instrument in meridian, observation at IX with movable thread.					1	359 59 36.33	- 20.20
23 3	50.6	.....	.....	20. Instrument in meridian; E. observation at III; W. observation at I with movable thread.					2	35.34	- 22.10
23 22	50.2	.....	.....						3	36.29	- 32.51
23 37	49.9	51.2	30.090						4	35.44	.....
8 53	35.6	37.4	30.210						5	36.26	.....
9 8	35.0	.....	.....						6	31.77	.....
9 19	34.7	.....	.....						7	35.46	.....
9 28	34.2	.....	.....						8	35.73	.....
9 41	33.6	36.3	30.220						9	34.85	.....
9 50	33.8	.....	.....						10	34.60	.....
9 59	33.7	.....	.....						11	35.86	.....
10 8	33.4	.....	.....						12	34.79	- 38.13
10 18	33.7	35.3	30.230	Notes.					13	34.43	.....
17 21 18	40.2	42.4	30.226	9. Preceding star observed.					14	35.16	.....
21 28	39.5	.....	.....	20. Hurried.					15	35.22	.....
21 43	38.9	.....	.....						16	35.68	- 36.18
21 56	38.3	.....	.....						17	35.47	- 37.41
22 8	37.7	40.8	30.224						18	35.10	- 26.70
									19	35.06	.....
									20	33.78	- 35.20

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	δ Cephei	W	3	22 23 7.0	2 33.8	49.55	49.55	.....	19 0 14.85	+ 0.48	-16.36	+ 20.72	+57 56 1.52
		E		22 28 1.0	2 20.2	49.50	49.75	.....	340 58 56.72	+ 0.56	+13.59	- 20.72	
2	67 Aquarii	W	2.5	22 36 5.0	2 12.7	50.30	50.45	.....	313 37 34.62	+ 1.35	+10.24	-1 3.01	- 7 27 35.59
		E	2	22 40 33.0	2 15.3	50.00	50.35	.....	46 21 34.35	+ 1.14	-10.64	+1 3.02	
3	94 H ¹ . Aquarii	E	2	22 47 39.0	2 37.5	50.30	50.55	.....	44 23 43.92	+ 1.40	-14.97	+ 58.86	- 5 29 36.60
		W		22 52 26.0	2 9.5	50.15	50.30	.....	315 35 30.08	+ 1.19	+10.12	- 58.88	
4	A Piscium	W	3	23 1 10.0	2 40.3	49.30	49.50	.....	322 41 28.38	+ 0.35	+17.98	- 45.88	+ 1 36 41.93
		E		23 6 10.0	2 19.7	49.75	49.90	.....	37 17 37.45	+ 0.78	-13.66	+ 45.89	
5	10 Andromedæ	E	3	23 15 .....	.....	50.05	50.25	24.646	357 21 10.62	+ 1.84	+ 0.30	- 2.78	+41 33 40.00
		W		.....	.....	50.10	50.25	24.646	2 38 3.10	+ 1.88	- 0.30	+ 2.78	
6	h ³ Aquarii	W	3	23 25 47.0	2 32.7	49.45	49.50	.....	299 39 24.78	+ 0.41	+10.59	-1 45.59	-21 26 27.84
		E		23 30 45.0	2 25.3	49.80	50.00	.....	60 19 42.50	+ 0.86	- 9.59	+1 45.60	
7	ω ² Aquarii	E	3	23 35 19.0	2 30.2	50.20	50.40	.....	53 57 54.45	+ 1.28	-11.43	+1 22.78	-15 4 15.41
		W		23 40 11.0	2 21.8	49.80	49.90	.....	306 1 14.52	+ 0.80	+10.19	-1 22.76	
8	November 19, L. I Pegasi	E	3	21 15 4.5	2 38.2	49.85	51.10	.....	19 30 53.48	+ 1.99	-29.97	+ 20.38	+19 24 5.43
		W		21 20 2.0	2 19.3	49.45	50.25	.....	340 28 19.02	+ 1.35	+23.24	- 20.38	
9	358 B. Cygni	W	2	21 26 3.0	2 15.3	49.10	50.20	.....	13 16 44.65	+ 1.14	-20.72	+ 13.58	+52 12 20.79
		E		21 30 33.0	2 14.7	49.55	50.65	.....	346 42 22.02	+ 1.60	+20.54	- 13.59	
10	ε Piscis Australis	E	2.5	21 36 53.0	2 25.2	49.00	51.35	.....	72 19 37.65	+ 2.16	- 7.83	+2 58.67	-33 27 39.56
		W		21 41 44.0	2 25.8	49.20	50.45	.....	287 39 27.48	+ 1.35	+ 7.90	-2 58.70	
11	134 G. Capricorni	W	2.5	21 50 41.0	2 45.9	48.50	49.45	.....	299 27 33.40	+ 0.48	+12.47	-1 41.49	-21 38 13.17
		E		21 55 36.0	2 9.1	49.75	50.90	.....	60 31 28.90	+ 1.85	- 7.55	+1 41.49	
12	27 Pegasi	E	2.5	22 5 .....	.....	49.90	51.50	25.713	6 11 23.30	+ 2.96	+ 0.22	+ 6.26	+32 42 44.21
		W		.....	.....	49.15	50.35	25.713	353 46 32.18	+ 1.97	- 0.22	- 6.26	
13	32 Pegasi	W	3	22 15 6.5	1 51.2	48.30	49.25	.....	348 55 25.58	+ 0.28	+24.17	- 11.27	+27 51 20.05
		E		22 18 38.3	1 40.6	49.70	50.75	.....	11 3 38.92	+ 1.76	-19.78	+ 11.27	
14	δ Cephei	E	3	22 23 12.0	2 29.1	49.00	51.35	.....	340 58 53.15	+ 2.14	+15.37	- 19.86	+57 56 1.91
		W		22 28 13.0	2 31.9	48.85	49.80	.....	19 0 16.42	+ 0.80	-15.96	+ 19.86	
15	30 Cephei	W	2.5	22 32 54.0	2 25.8	48.40	49.55	.....	24 9 45.25	+ 0.49	- 9.97	+ 25.86	+63 5 44.12
		E		22 37 35.0	2 15.2	49.60	50.75	.....	335 49 22.50	+ 1.70	+ 8.57	- 25.88	
16	γ Piscis Australis	E	3	22 44 54.0	2 21.8	50.30	51.65	.....	72 14 52.20	+ 2.50	- 7.48	+2 58.55	-33 22 53.87
		W		22 49 28.0	2 12.2	48.85	49.80	.....	287 44 15.98	+ 0.80	+ 6.50	-2 58.74	
17	5 Andromedæ	W	2.5	23 3 .....	.....	48.90	49.95	27.712	9 49 8.40	+ 0.20	- 0.38	+ 10.06	+48 46 55.87
		E		.....	.....	48.90	50.10	27.712	350 6 9.48	+ 0.24	+ 0.38	- 10.06	
18	τ Pegasi	E	3	23 13 21.5	2 36.5	49.80	50.95	.....	15 41 46.58	+ 1.92	-35.29	+ 16.29	+23 13 21.73
		W		23 18 17.5	2 19.5	49.80	50.55	.....	344 17 26.00	+ 1.71	+28.04	- 16.29	
19	72 Pegasi	W	3	23 29 .....	.....	48.85	49.90	28.320	351 50 19.02	+ 0.12	- 0.20	- 8.27	+30 48 13.18
		E		.....	.....	48.85	50.00	28.320	8 4 9.18	+ 0.16	+ 0.20	+ 8.27	
20	ω ¹ Aquarii	W	3	23 35 12.0	2 37.4	49.50	50.50	.....	306 1 8.85	+ 1.51	+12.55	-1 19.60	-15 4 15.37
		E		23 40 9.0	2 19.6	49.30	50.45	.....	53 57 56.38	+ 1.41	- 9.87	+1 19.62	

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1904 o.
<i>h m s</i>	<i>°</i>	<i>°</i>	<i>in.</i>				<i>° ' "</i>	<i>"</i>
17 22 25	57.2			17 12	Instrument in meridian, observation at I with movable thread.	1	359 59 14.92	-46.81
22 59	57.1			17 19	Instrument in meridian, observation at IX with movable thread.	2	35 54	-10.08
23 09	57.0	38.9	30.220			3	35 86	-26.08
23 11	56.9	.....				4	35 64	-22.21
23 14	56.2					5	34 48	-12.55
23 25	55.4					6	34 28	-14.09
23 35	55.6	37.7	30.209			7	34 02	
23 48	54.6	55.6	29.985			8	34 56	
23 49	54.2					9	34 61	-36.08
23 49	54.0					10	34 34	-10.49
23 51	54.1					11	34 28	-14.59
23 51	54.1					12	35 04	-39.14
23 52	54.3					13	35 46	-30.99
23 52	54.3					14	35 06	-16.87
23 52	54.3					15	34 06	-17.19
23 52	54.3					16	35 16	-10.36
23 52	54.3	54.1	29.989			17	35 62	-14.41
23 52	54.3					18	34 48	
23 52	54.3					19	35 51	
23 52	49.7					20	35 42	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	25 Piscium	E	3	23 45 40.0	2 34.6	49.80	50.60	.....	37 20 36.88	+ 1.71	-16.71	+ 44.26	+ 1 33 45.79
		W	...	23 50 57.0	2 42.4	49.80	50.55	.....	322 38 28.38	+ 1.68	+18.44	- 44.28	
2	5 Ceti	W	3	0 0 48.0	2 34.1	48.70	49.70	.....	318 6 18.42	+ 0.68	+15.07	- 52.11	- 2 58 30.51
		E	...	0 5 39.0	2 16.9	49.00	50.30	.....	41 52 47.22	+ 1.14	-11.89	+ 52.12	
3	σ Andromedæ	E	3	0 13 .....	.....	49.20	50.30	25.886	2 38 25.32	+ 1.97	+ 0.24	+ 2.70	+36 15 39.54
		W	...	.....	.....	49.65	50.85	25.886	357 19 16.25	+ 2.50	- 0.24	- 2.70	
4	κ Cassiopeïæ	W	3	0 25 6.5	2 33.2	48.65	49.90	.....	23 28 39.78	+ 0.76	-11.57	+ 25.29	+62 24 36.41
		E	...	0 30 9.0	2 29.3	48.95	50.10	.....	336 30 28.22	+ 1.01	+10.99	- 25.29	
5	ο Cassiopeïæ	E	3	0 39 .....	.....	49.30	50.25	25.913	351 8 15.55	+ 2.00	+ 0.37	- 9.07	+47 45 59.51
		W	...	.....	.....	49.75	50.75	25.913	8 49 23.18	+ 2.51	- 0.37	+ 9.06	
6	20 Ceti	W	3	0 45 31.0	2 40.2	49.30	50.30	.....	319 25 12.30	+ 1.31	+16.74	- 49.85	- 1 39 38.37
	November 21, L.	E	...	0 50 19.0	2 7.8	49.10	50.35	.....	40 33 50.28	+ 1.25	-10.65	+ 49.85	
7	ζ Cygni	E	2.5	21 9 .....	.....	49.10	50.90	26.364	9 3 9.60	+ 1.56	+ 0.19	+ 9.19	+29 50 29.67
		W	...	.....	.....	50.15	51.70	26.364	350 53 53.25	+ 2.53	- 0.19	- 9.19	
8	α Cephei	W	2.5	21 13 46.5	2 34.4	49.90	51.20	.....	23 15 23.28	+ 1.41	-11.95	+ 24.73	+62 11 19.74
		E	...	21 18 30.5	2 9.6	49.00	50.45	.....	336 43 47.20	+ 0.58	+ 8.42	- 24.73	
9	δ Ursæ Majoris s. p.	E	4	21 23 32.0	2 34.1	49.10	50.45	.....	289 12 13.22	+ 0.64	- 3.61	-2 43.60	+70 14 35.40
		W	...	21 28 12.0	2 5.9	50.15	51.55	.....	70 46 54.65	+ 1.71	+ 2.41	+2 43.61	
10	89 B. Ursæ Majoris s. p.	W	4	21 31 45.0	2 22.8	50.10	51.45	.....	71 21 29.30	+ 1.65	+ 3.17	+2 48.96	+69 39 53.40
		E	...	21 36 24.0	2 16.2	48.85	50.40	.....	288 37 34.80	+ 0.46	- 2.89	-2 49.02	
11	109 B. Ursæ Majoris s. p.	W	4	21 47 22.0	2 31.9	50.00	51.45	.....	67 42 19.32	+ 1.57	+ 3.03	+2 19.63	+73 19 34.70
		E	...	21 52 22.0	2 28.1	48.85	50.45	.....	292 16 48.52	+ 0.48	- 2.88	-2 19.69	
12	16 Cephei	E	2.5	21 55 53.0	2 4.4	49.05	50.55	.....	326 11 25.60	+ 0.65	+ 3.50	- 38.57	+72 44 0.64
		W	...	22 0 22.0	2 24.6	50.25	51.40	.....	33 47 43.42	+ 1.70	- 4.73	+ 38.59	
13	24 Cephei	E	3	22 5 32.0	2 30.6	49.05	50.50	.....	327 2 39.85	+ 0.60	+ 5.50	- 37.39	+71 52 43.39
		W	...	22 10 25.0	2 22.4	50.30	51.50	.....	32 56 27.62	+ 1.75	- 4.92	+ 37.41	
14	30 H. Ursæ Majoris s. p.	W	4	22 15 10.0	2 7.6	50.20	51.35	.....	74 58 8.75	+ 1.62	+ 2.90	+3 31.93	+66 2 33.62
		E	...	22 19 28.0	2 10.4	48.85	50.15	.....	285 1 0.60	+ 0.33	- 3.03	-3 31.98	
15	9 H. Draconis s. p.	E	3.5	22 24 27.0	2 33.6	48.75	50.05	.....	295 8 48.35	+ 0.23	- 2.64	-2 2.42	+76 11 52.20
		W	...	22 29 12.0	2 11.4	50.30	51.50	.....	64 50 19.55	+ 1.75	+ 1.93	+2 2.42	
16	220 H ¹ . Draconis s. p.	W	2.5	8 49 35.0	2 22.9	50.55	51.05	.....	60 50 19.58	+ 1.21	+ 1.69	+1 46.23	+80 12 9.88
		E	...	8 54 40.0	2 42.1	49.85	50.45	.....	299 8 49.82	+ 0.55	- 2.17	-1 46.26	
17	98 B. Cephei s. p.	E	2.5	9 4 54.0	2 33.8	49.95	50.25	.....	296 41 43.02	+ 0.52	- 2.39	-1 57.80	+77 44 52.00
		W	...	9 9 56.0	2 28.2	50.60	50.85	.....	63 17 24.68	+ 1.16	+ 2.21	+1 57.83	
18	B. A. C. 7504 s. p.	W	2	9 14 16.0	4 29.3	50.40	50.85	.....	54 23 47.98	+ 1.06	+ 2.21	+1 22.98	+86 39 4.28
		E	...	9 19 8.0	0 22.7	49.80	50.10	.....	305 35 18.92	+ 0.37	- 0.02	-1 23.00	
19	δ Ursæ Majoris	E	2	9 23 35.0	2 31.2	49.80	50.15	.....	328 40 47.20	+ 0.38	+ 6.31	- 36.22	+70 14 34.24
		W	...	9 28 23.0	2 16.8	50.60	50.75	.....	31 18 20.52	+ 1.08	- 5.16	+ 36.22	
20	89 B. Ursæ Majoris	W	2	9 32 28.0	1 39.9	50.40	50.65	.....	30 43 39.05	+ 0.96	- 2.88	+ 35.38	+69 39 53.58
		E	...	9 36 53.0	2 45.1	50.00	50.10	.....	329 15 25.88	+ 0.48	+ 7.86	- 35.38	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
19 23 48	49.6	51.4	29.932	3. 5. 7. Instrument in meridian, observation at I with movable thread.						1	359 59 35.18	-20.67
0 3	48.6	.....	.....							2	35 32	-18.71
0 16	48.3	.....	.....							3	34 92	.....
0 28	47.9	.....	.....							4	34 60	-30.25
0 38	47.6	.....	.....							5	34 62	.....
0 48	47.6	49.7	29.924							6	35 62	.....
21 21 7	52.1	54.2	29.826							7	34 88	.....
21 17	52.2	.....	.....							8	34 47	.....
21 26	52.1	.....	.....							9	34 52	.....
21 34	52.1	.....	.....							10	33 22	+35.05
21 50	51.5	53.1	29.840							11	34 28	.....
21 59	51.2	.....	.....							12	35 08	-38.32
22 8	50.6	.....	.....							13	35 21	.....
22 18	50.3	.....	.....							14	35 60	.....
22 27	50.3	52.2	29.846							15	34 58	.....
8 53	36.7	38.7	29.853							16	35 32	.....
9 9	36.3	.....	.....							17	34 59	.....
9 18	36.1	.....	.....							18	35 25	.....
9 26	36.0	.....	.....							19	35 16	.....
9 40	16.0	37.8	29.846							20	35 68	+35.09

Note.

2 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	109 B. Ursæ Majoris	E W	2 ...	9 46 34.0 9 51 22.0	3 20.0 1 28.0	50.05 50.50	50.45 50.60	..... .....	325 35 49.15 34 23 13.52	+ 0.69 + 0.98	+ 8.62 - 1.67	- 40.73 + 40.72	+73 19 34.65
2	16 Cephei s. p.	W E	3 ...	9 55 26.0 10 0 28.0	2 31.4 2 30.6	50.65 50.05	50.65 50.30	..... .....	68 17 42.50 291 41 24.65	+ 1.09 + 0.61	+ 3.10 - 3.07	+2 28.68 -2 28.80	+72 44 2.27
3	24 Cephei s. p.	E W	2.5 3	10 5 24.0 10 10 22.0	2 38.7 2 19.3	49.75 50.15	49.95 50.60	..... .....	290 50 13.72 69 8 53.95	+ 0.23 + 0.79	- 3.56 + 2.74	-2 35.61 +2 35.73	+71 52 44.04
4	30 H. Ursæ Majoris	W E	2.5 ...	10 15 12.0 10 19 25.0	2 5.7 2 7.3	50.55 50.05	50.80 50.30	..... .....	27 6 24.52 332 52 43.85	+ 1.09 + 0.59	- 5.97 + 6.13	+ 30.56 - 30.56	+66 2 31.84
5	9 H. Draconis	E W	2.5 ...	10 24 28.0 10 29 36.0	2 32.7 2 35.3	49.90 50.55	49.75 50.80	..... .....	322 43 43.12 37 15 28.05	+ 0.25 + 1.12	+ 3.90 - 4.03	- 45.38 + 45.37	+76 11 51.06
6	November 23, L. α Cephei	E W	3 ...	21 13 33.0 21 18 2.0	2 48.2 1 40.8	49.85 49.60	51.10 50.75	..... .....	336 43 41.78 23 15 17.45	+ 1.55 + 1.24	+14.18 - 5.09	- 24.74 + 24.73	+62 11 19.52
7	d Ursæ Majoris s. p.	W E	3 ...	21 23 0.0 21 28 6.0	3 6.5 1 59.5	49.55 49.70	50.45 50.80	..... .....	70 46 52.45 289 12 12.02	+ 1.05 + 1.34	+ 5.28 - 2.17	+2 43.57 -2 43.59	+70 14 35.88
8	89 B. Ursæ Majoris s. p.	E W	3 ...	21 31 40.0 21 35 34.0	2 28.2 1 25.8	49.70 49.55	50.65 50.55	..... .....	288 37 37.15 71 21 31.80	+ 1.26 + 1.12	- 3.42 + 1.15	-2 48.97 +2 49.01	+69 39 54.73
9	158 B. Cephei	W E	2.5 ...	21 50 28.0 21 54 15.0	1 16.2 2 30.8	48.90 49.50	49.95 50.25	..... .....	34 19 11.25 325 39 53.82	+ 0.47 + 0.96	- 1.26 + 4.93	+ 39.35 - 39.36	+73 15 31.47
10	27 Pegasi	W E	2.5 ...	22 5 ..... .....	..... .....	48.65 49.50	49.55 50.55	27.353 27.353	353 45 28.00 6 10 19.35	- 0.58 + 0.33	- 0.22 + 0.22	- 6.28 + 6.28	+32 42 44.11
11	30 H. Ursæ Majoris s. p.	E W	3 ...	22 14 30.0 22 19 44.0	2 48.0 2 26.0	49.70 49.40	50.85 50.30	..... .....	285 1 1.48 74 58 9.75	+ 1.34 + 0.87	- 5.04 + 3.80	-3 31.78 +3 31.82	+66 2 33.14
12	9 H. Draconis s. p.	W E	2.5 ...	22 24 25.0 22 29 10.0	2 36.1 2 8.9	49.30 49.60	50.30 50.75	..... .....	64 50 20.90 295 8 46.68	+ 0.83 + 1.22	+ 2.73 - 1.86	+2 2.38 -2 2.44	+76 11 51.64
13	35 H. Ursæ Majoris s. p.	E W	3 ...	22 33 50.0 22 38 40.0	2 26.2 2 23.8	49.70 49.50	50.70 50.55	..... .....	288 31 52.28 71 27 15.05	+ 1.28 + 1.09	- 3.34 + 3.23	-2 50.71 +2 50.78	+69 34 7.94
14	d Ursæ Majoris	W E	3.5 ...	9 22 57.0 9 28 0.0	3 9.7 1 53.3	49.20 50.05	49.50 50.40	..... .....	31 18 27.55 328 40 48.42	+ 0.73 + 1.63	- 9.93 + 3.54	+ 35.62 - 35.59	+70 14 34.72
15	89 B. Ursæ Majoris	E W	3.5 ...	9 32 17.0 9 36 34.0	1 51.4 2 25.6	50.30 49.15	50.55 49.50	..... .....	329 15 28.48 30 43 44.25	+ 1.86 + 0.73	+ 3.58 - 6.12	- 34.75 + 34.73	+69 39 53.95
16	158 B. Cephei s. p.	W E	4 4.5	9 49 38.0 9 56 47.0	2 6.3 5 2.7	48.95 49.85	49.20 50.00	..... .....	67 46 20.50 292 12 57.58	+ 0.44 + 1.32	+ 2.11 -12.11	+2 22.55 -2 22.72	+73 15 32.50
17	30 H. Camelop.	E W	2.5 3.5	10 15 55.0 10 20 16.0	3 34.5 0 46.5	50.30 49.35	50.50 49.75	..... .....	315 53 32.85 44 5 34.85	+ 1.83 + 0.96	+ 3.40 - 0.16	- 56.90 + 56.88	+83 2 12.42
18	9 H. Draconis	W E	3.5 ...	10 24 32.0 10 29 34.0	2 29.3 2 32.7	49.30 49.65	49.70 49.95	..... .....	37 15 28.15 322 43 42.45	+ 0.91 + 1.22	- 3.73 + 3.90	+ 44.62 - 44.57	+76 11 50.22
19	35 H. Ursæ Majoris	E W	3.5 ...	10 33 42.0 10 38 42.0	2 34.4 2 25.6	49.90 49.40	50.15 49.80	..... .....	329 21 12.40 30 37 58.12	+ 1.44 + 1.02	+ 6.93 - 6.16	- 34.67 + 34.65	+69 34 7.50
20	November 26, L. κ Capricorni	W E	3 3.5	21 34 50.0 21 40 20.0	2 33.1 2 56.9	47.95 50.65	48.50 51.50	..... .....	301 47 45.38 58 11 27.80	+ 0.04 + 2.95	+11.05 -14.74	-1 35.37 +1 35.42	-19 17 58.43

Time	Ther. 1882	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
21 9 10	16.2		29.514	19. Instrument in meridian, observation at IX with movable thread.				1	359 59 35.64	.....
9 59	15.6		29.514					2	34 18	38.45
10 9	14.1		29.514					3	34 00	.....
10 15	14.6		29.514					4	35 40	.....
10 25	14.8	46.7	29.514					5	36 20	.....
21 21 11	45.1	60.7	29.566					6	35 55	.....
21 26	45.5		29.566					7	31 08	.....
21 35	45.2		29.592					8	34 55	+35.24
21 47	46.9	49.4	29.592					9	35 08	.....
22 15	46.6		29.592					10	35 16	32.26
22 37	45.6	48.4	29.581					11	36 12	.....
9 27	17.1	37.6	29.124					12	35 22	.....
9 12	16.8		29.124	Notes:				13	34 51	+40.47
9 14	14.7		29.124	6 9.20 Clouds				14	35 08	.....
10 0	14.1		29.124	14 Fog				15	36 18	+35.29
10 19	13.7		29.124	16 Paint and diffuse fog.				16	34 54	.....
10 28	13.0		29.124					17	36 86	+37.71
10 31	13.2	46.9	29.118					18	36 48	.....
20 21 35	18.6	49.5	29.990					19	36 86	+40.50
								20	36 26	+10.13

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ε Pegasi	E	3	22 0 7.5	2 30.3	50.55	51.15	.....	14 2 7.85	+ 2.71	-35.83	+ 14.87	+24 53 3.24
		W	...	22 5 13.5	2 35.7	50.55	50.95	.....	345 56 56.42	+ 2.62	+38.46	- 14.88	
2	λ Piscium	E	3	23 34 46.0	2 28.7	51.05	51.55	.....	37 38 51.65	+ 3.18	-15.36	+ 45.97	+ 1 15 27.29
		W	...	23 39 25.5	2 10.8	51.15	51.80	.....	322 20 17.30	+ 3.35	+11.88	- 45.97	
3	ρ Cassiopeiae	W	2.5	23 47 6.5	2 35.7	50.30	50.65	.....	18 2 45.25	+ 2.34	-18.09	+ 19.43	+56 58 29.21
		E	...	23 52 6.0	2 23.8	49.90	50.30	.....	341 56 26.02	+ 1.94	+15.43	- 19.43	
4	5 Ceti	E	3	0 0 38.0	2 45.1	50.70	51.00	.....	41 52 50.55	+ 2.73	-17.29	+ 53.43	- 2 58 36.53
		W	3.5	0 7 30.5	4 7.4	50.70	50.75	.....	318 5 54.88	+ 2.61	+38.83	- 53.43	
5	ε Ceti	W	3.5	0 11 56.0	2 42.2	50.15	50.50	.....	311 44 4.25	+ 2.19	+14.76	- 6.73	- 9 21 4.93
		E	2.5	0 17 11.0	2 32.8	50.50	50.70	.....	48 15 1.68	+ 2.46	-13.09	+ 6.73	
6	49 G. Ceti	E	3	0 23 3.0	2 37.5	50.75	50.70	.....	63 11 58.82	+ 2.60	-10.74	+ 57.61	-24 18 55.20
	November 28, L.	W	...	0 27 42.0	2 1.5	51.00	51.25	.....	296 47 12.68	+ 3.01	+ 6.39	- 57.65	
7	1 H. Draconis s. p.	W	2	21 20 58.0	2 38.6	50.05	50.05	.....	59 18 4.95	+ 1.14	+ 1.78	+ 41.51	+81 44 29.30
		E	...	21 25 16.0	1 39.4	49.05	48.80	.....	300 41 3.68	- 0.01	- 0.70	- 41.53	
8	11 Cephei	E	2	21 37 41.0	2 54.5	49.25	49.35	.....	328 2 35.32	+ 0.36	+ 8.00	- 37.70	+70 52 47.01
		W	...	21 43 0.0	2 24.5	50.25	50.20	.....	31 56 33.02	+ 1.30	- 5.48	+ 37.70	
9	158 B. Cephei	E	2	21 49 5.0	2 39.6	49.45	49.55	.....	325 39 56.25	+ 0.57	+ 5.52	- 41.26	+73 15 31.25
		W	...	21 54 6.0	2 21.4	50.40	50.75	.....	34 19 11.50	+ 1.67	- 4.33	+ 41.28	
10	π Pegasi	W	2	22 6 ....	.....	50.05	50.20	28.026	353 45 14.55	+ 0.48	- 0.22	- 6.58	+32 42 58.34
		E	...	.....	.....	49.40	49.10	28.026	6 9 38.62	- 0.41	+ 0.22	+ 6.58	
11	32 Ursæ Majoris s. p.	E	3	22 10 42.0	0 28.0	49.35	49.15	.....	284 33 23.12	+ 0.32	- 0.14	- 3 49.36	+65 34 40.74
		W	...	22 15 8.0	3 58.0	50.35	50.45	.....	75 25 37.92	+ 1.49	+10.26	+ 3 49.33	
12	30 H. Camelop. s. p.	W	2	22 18 16.0	1 15.1	50.35	49.95	.....	58 0 28.25	+ 1.23	+ 0.34	+ 36.68	+83 2 12.75
		E	...	22 22 2.0	2 30.9	49.50	49.30	.....	301 58 43.08	+ 0.46	- 1.38	- 36.69	
13	226 B. Cephei	E	2.5	22 27 17.0	3 24.6	49.60	49.70	.....	323 10 58.02	+ 0.71	+ 7.30	- 45.30	+75 44 31.69
		W	...	22 31 22.0	0 40.4	50.20	50.00	.....	36 48 4.45	+ 1.18	- 0.28	+ 45.31	
14	35 H. Ursæ Majoris s. p.	W	3	22 35 40.0	0 37.4	50.35	50.25	.....	71 27 10.85	+ 1.39	+ 0.22	+ 58.96	+69 34 6.90
		E	...	22 39 18.0	3 0.6	49.05	49.50	.....	288 32 2.12	+ 0.65	- 5.09	- 59.00	
15	ε Cephei	E	2	22 44 17.0	2 5.1	49.60	49.10	.....	333 12 55.68	+ 0.41	+ 6.06	- 30.56	+65 42 20.99
		W	...	22 48 33.0	2 10.9	50.35	50.15	.....	26 46 14.85	+ 1.33	- 6.64	+ 30.56	
16	1 H. Draconis	E	4	9 21 8.0	2 28.8	50.30	50.00	.....	317 11 17.62	+ 1.32	+ 1.99	- 55.82	+81 44 27.61
		W	...	9 26 10.0	2 33.2	49.70	49.40	.....	42 47 52.45	+ 0.71	- 2.10	+ 55.81	
17	32 Ursæ Majoris	E	3.5	10 7 3.0	4 7.2	50.10	49.60	.....	333 20 18.58	+ 1.01	+23.89	- 30.23	+65 34 39.13
		W	...	10 12 41.0	1 30.8	49.05	48.80	.....	26 38 30.98	+ 0.06	- 3.22	+ 30.22	
18	30 H. Camelop.	W	3	10 17 28.0	2 3.3	49.05	48.75	.....	44 5 34.30	+ 0.03	- 1.12	+ 58.32	+83 2 12.31
		E	...	10 22 15.0	2 43.7	50.10	49.70	.....	315 53 35.05	+ 1.07	+ 1.98	- 58.32	
19	35 H. Ursæ Majoris	W	3	10 33 32.0	2 45.5	48.90	48.65	.....	30 37 57.38	- 0.09	- 7.96	+ 35.07	+69 34 6.05
		E	...	10 38 25.0	2 7.5	50.30	50.20	.....	329 21 15.88	+ 1.42	+ 4.72	- 35.07	
20	36 H. Cephei s. p.	E	3	10 52 22.0	2 58.6	50.40	50.20	.....	302 47 1.48	+ 1.47	- 1.72	- 33.25	+83 50 36.33
		W	...	10 58 44.0	3 23.4	49.40	49.40	.....	57 12 5.85	+ 0.54	+ 2.23	+ 33.24	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
26 22 3	37.6	39.9	29.904	10. Instrument in meridian, observation at IX with movable thread.	1	359 59 30.11	.....
23 37	36.4	38.4	29.904		2	36.00	- 20.61
23 50	36.4	.....	.....		3	36.44	- 33.93
0 4	36.2	.....	.....		4	36.16	- 18.26
0 15	36.1	.....	.....		5	36.12	.....
0 26	35.6	.....	.....		6	36.36	- 10.72
28 21 24	30.7	33.1	29.952		7	35.41	.....
21 41	30.6	.....	.....		8	36.26	.....
21 52	30.7	.....	.....		9	35.60	.....
22 3	30.3	32.2	29.968		10	35.91	.....
22 13	30.3	.....	.....		11	36.47	.....
22 30	30.0	.....	.....		12	35.98	+ 38.06
22 40	29.7	.....	.....		13	35.79	.....
22 47	30.0	31.8	29.970	1, 4, 14. Clouds.	14	35.05	+ 36.95
9 24	30.0	30.7	29.838	18 E. One microscope reading increased 10".	15	35.84	.....
10 6	30.4	31.3	29.824	20. Bisection uncertain; clouds.	16	35.99	.....
10 26	30.2	.....	.....		17	35.64	.....
10 37	30.1	.....	.....		18	35.06	+ 38.00
10 50	.....	31.3	29.818		19	35.68	+ 36.11
10 55	30.3	.....	.....		20	34.92	- 38.34

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	November 30, L. Aquarii	E W	3 ...	21 23 59.0 21 28 47.0	2 36.9 2 11.1	51.25 49.55	53.10 50.85	..... .....	44 53 23.52 315 5 48.12	+ 4.01 + 1.99	-14.72 +10.27	+ 57.69 - 57.72	- 5 59 17.19
2	Piscis Australis	W E	3 ...	21 37 4.0 21 41 24.0	2 15.4 2 4.6	48.10 50.50	48.80 51.50	..... .....	287 39 32.00 72 19 34.75	+ 0.20 + 2.81	+ 6.81 - 5.77	-3 0.28 +3 0.36	-33 27 39.98
3	134 G. Capricorni	E W	3.5 ...	21 50 38.0 21 55 1.0	2 50.3 1 32.7	50.70 51.15	51.35 51.50	..... .....	60 31 33.98 299 27 40.98	+ 2.84 + 3.15	-13.13 + 3.89	+1 42.51 -1 42.56	-21 38 13.64
4	μ Piscis Australis	E W	3 ...	21 59 41.0 22 4 44.0	3 11.7 1 51.3	49.55 50.55	50.45 51.10	..... .....	72 19 18.22 287 39 57.98	+ 1.70 + 2.64	-13.65 + 4.60	+ 3 0.63 - 3 0.71	-33 27 14.51
5	30 H. Camelop. s. p.	E W	3 ...	22 16 50.0 22 21 34.0	2 41.8 2 2.2	48.55 50.20	49.20 51.05	..... .....	301 58 41.25 58 0 29.98	+ 0.64 + 2.43	- 1.59 + 0.91	-1 33.05 +1 33.09	+83 2 13.69
6	49 G. Piscis Australis	W E	3 ...	22 33 14.0 22 36 42.0	0 17.9 3 10.1	49.30 48.40	49.95 49.35	..... .....	287 32 39.30 72 26 43.08	+ 1.41 + 0.64	+ 0.12 -13.40	-3 2.49 +3 2.58	-33 34 40.55
7	γ Piscis Australis	W E	3.5 ...	22 45 32.0 22 49 7.0	1 45.3 1 49.7	50.10 48.95	50.45 49.60	..... .....	287 44 18.30 72 14 49.62	+ 2.08 + 1.05	+ 4.12 - 4.48	-3 0.55 +3 0.58	-33 22 54.68
8	5 Andromedæ	E W	2 ...	23 3 ..... .....	..... .....	49.70 50.75	49.85 50.95	26.182 26.182	350 7 9.65 9 50 9.70	+ 2.30 + 3.40	+ 0.38 - 0.38	- 10.17 + 10.17	+48 46 57.09
9	τ Pegasi	W E	3 ...	23 13 22.3 23 18 9.5	2 37.1 2 10.1	49.75 49.05	50.10 49.60	..... .....	344 17 21.10 15 41 38.52	+ 1.71 + 1.10	+35.56 -24.40	- 16.46 + 16.46	+23 13 21.85
10	72 Pegasi	E W	3 ...	23 29 ..... .....	..... .....	49.30 50.80	49.65 51.05	25.128 25.128	8 6 17.30 351 52 28.00	+ 1.99 + 3.47	+ 0.20 - 0.20	+ 8.36 - 8.36	+30 48 14.26
11	λ Piscium	W E	2.5 ...	23 34 28.0 23 39 13.5	2 47.2 1 58.3	50.30 48.75	50.40 49.30	..... .....	322 20 10.50 37 38 49.42	+ 2.15 + 0.79	+19.41 - 9.72	- 45.21 + 45.21	+ 1 15 27.31
12	274 G. Aquarii	E W	3.5 ...	23 45 58.0 23 50 43.0	2 31.1 2 13.9	49.35 50.75	49.85 51.00	..... .....	63 38 38.88 296 20 31.22	+ 1.38 + 2.69	- 9.82 + 7.71	+1 57.86 -1 57.89	-24 45 35.55
13	33 Piscium	W E	3 ...	23 57 49.0 0 2 46.0	2 42.7 2 14.3	50.10 48.80	50.35 49.60	..... .....	314 50 38.28 45 8 26.40	+ 2.03 + 0.97	+15.75 -10.73	- 58.95 + 58.97	- 6 14 22.52
14	12 Ceti	E W	3 ...	0 22 29.0 0 27 21.5	2 46.0 2 6.5	50.00 51.10	50.00 51.20	..... .....	43 23 11.98 316 36 3.75	+ 1.79 + 2.93	-16.96 + 9.85	+ 55.53 - 55.54	- 4 28 58.95
15	0 Cassiopeiæ	W E	2.5 ...	0 39 ..... .....	..... .....	50.45 48.95	50.55 49.35	27.447 27.447	8 48 25.05 351 7 15.10	+ 1.58 + 0.20	- 0.37 + 0.37	+ 9.16 - 9.16	+47 46 1.63
16	20 Ceti	E W	3 ...	0 45 25.0 0 50 18.0	2 47.8 2 5.2	49.50 51.10	49.70 51.25	..... .....	40 34 0.10 319 25 17.90	+ 1.38 + 3.00	-18.36 +10.22	+ 50.38 - 50.41	- 1 39 39.67
17	11 Cephei s. p.	W E	4 4.5	9 38 10.0 9 43 36.0	2 25.8 3 0.2	50.55 49.00	50.80 49.00	..... .....	70 8 40.15 289 50 30.52	+ 1.77 + 0.06	+ 3.14 - 4.80	+2 45.90 -2 45.86	+70 52 47.75
18	32 Ursæ Majoris	W E	3 ...	10 7 28.0 10 11 21.0	3 42.6 0 10.4	51.25 49.45	51.30 49.35	..... .....	26 38 45.25 333 20 43.92	+ 2.38 + 0.47	-19.38 + 0.04	+ 30.26 - 30.26	+65 34 38.90
19	29 H. Camelop.	E W	3 3.5	10 15 20.0 10 19 18.0	0 33.5 3 24.5	49.55 51.10	49.40 51.00	..... .....	314 12 8.40 45 47 2.30	+ 0.56 + 2.16	+ 0.06 - 2.27	-1 1.90 +1 1.90	+84 43 45.21
20	2 Cephei s. p.	E W	4 ...	10 43 56.0 10 48 40.0	2 26.3 2 17.7	49.05 50.80	48.90 50.50	..... .....	284 41 5.58 75 18 7.15	+ 0.04 + 1.74	- 3.86 + 3.42	-3 46.21 +3 46.24	+65 42 21.77

Time.	Ther. (°C.)	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.								No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>										<i>° ' "</i>	<i>"</i>
10 28	45.1	46.4	29.638	8.10. Instrument in meridian, observation at I with movable thread.								1	359 59 36.58	-10.21
11 40	44.0	---	---	10. Instrument in meridian, observation at IX with movable thread.								2	35.44	-14.03
11 53	44.1	---	---									3	35.83	-10.05
12 2	43.9	---	---									4	35.75	-9.68
12 10	42.9	41.4	29.646									5	36.81	-9.54
12 19	42.2	---	---									6	36.62	-34.99
12 49	42.6	---	---									7	36.36	-20.35
13 2	41.3	---	---									8	36.52	-11.14
13 16	43.2	---	---									9	36.80	---
13 28	42.7	---	---									10	36.31	---
13 38	40.6	41.7	29.712									11	36.28	---
13 49	40.5	---	---									12	36.02	---
14 6	40.1	---	---									13	36.36	---
14 16	39.6	---	---									14	36.66	---
14 17	39.3	---	---									15	37.06	---
14 28	38.9	40.1	29.762									16	37.10	---
14 41	38.5	---	---									17	35.44	---
14 5	38.5	---	---									18	36.34	---
14 22	38.5	---	---									19	35.60	---
14 40	38.5	---	---									20	37.05	---

Notes.
6. Clouds.
1-16. High wind.
17. Woolly.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	36 H. Cephei s. P.	W	4	10 52 46.0	2 32.0	50.70	50.50	.....	57 12 7.25	+ 1.69	+ 1.25	+ 1 33.33	+83 50 35.91
	December 1. L.	E	...	10 58 28.0	3 10.0	49.35	49.00	.....	302 47 3.92	+ 0.24	- 1.95	- 1 33.40	
2	ε Pegasi	E	2.5	21 37 12.0	2 22.0	49.05	49.70	.....	29 28 6.30	+ 0.68	- 17.15	+ 33.03	+ 9 26 29.50
		W	...	21 41 38.5	2 4.5	50.45	50.80	.....	330 31 6.32	+ 1.94	+ 13.19	- 33.04	
3	20 Pegasi	W	2.5	21 53 50.5	2 40.1	48.50	49.15	.....	333 44 25.78	+ 0.09	+ 23.99	- 28.89	+ 12 40 1.16
		E	...	21 59 35.0	3 4.4	49.90	50.00	.....	26 14 53.75	+ 1.25	- 31.82	+ 28.91	
4	32 Ursæ Majoris s. P.	W	2.5	22 9 24.0	1 46.7	49.15	49.75	.....	75 25 54.70	+ 0.76	+ 2.06	+ 3 41.85	+ 65 34 39.18
		E	...	22 13 46.0	2 35.3	49.50	49.90	.....	284 33 16.35	+ 1.00	- 4.37	- 3 41.82	
5	29 H. Camelop. s. P.	E	2.5	22 16 54.0	1 0.2	49.50	49.85	.....	303 40 6.85	+ 0.99	- 0.17	- 1 27.69	+ 84 43 48.42
		W	...	22 20 16.0	4 22.2	48.95	49.65	.....	56 18 58.20	+ 0.58	+ 3.22	+ 1 27.70	
6	σ Aquarii	W	2.5	22 23 35.0	2 5.1	48.50	49.20	.....	309 55 29.38	+ 0.13	+ 8.50	- 1 9.89	- 11 9 51.22
		E	...	22 28 6.0	2 25.9	49.60	50.05	.....	50 3 44.50	+ 1.14	- 11.55	+ 1 9.92	
7	30 Cephei	E	2.5	22 32 48.0	2 33.1	49.80	50.10	.....	335 49 21.85	+ 1.26	+ 10.99	- 26.32	+ 63 5 44.48
		W	...	22 37 45.0	2 23.9	49.05	49.65	.....	24 9 46.02	+ 0.66	- 9.71	+ 26.34	
8	ε Cephei	W	2.5	22 43 33.5	2 48.9	48.95	49.35	.....	26 46 20.80	+ 0.42	- 11.05	+ 29.63	+ 65 42 20.30
		E	...	22 48 54.0	2 31.6	49.60	50.25	.....	333 12 52.18	+ 1.22	+ 8.90	- 29.66	
9	36 H. Cephei	E	3	22 52 46.0	2 34.5	50.00	50.55	.....	315 5 13.72	+ 1.59	+ 1.54	- 58.57	+ 83 50 35.02
		W	...	22 57 46.0	2 25.5	49.25	49.70	.....	44 53 56.85	+ 0.78	- 1.36	+ 58.61	
10	70 Pegasi	E	3	23 21 49.5	2 34.9	50.70	50.95	.....	26 40 26.20	+ 2.14	- 22.16	+ 29.65	+ 12 14 16.92
	December 6. L.	W	...	23 26 24.5	2 0.1	50.05	50.30	.....	333 18 51.08	+ 1.48	+ 13.32	- 29.66	
11	ε Pegasi	W	2	21 38 39.0	0 55.6	50.10	49.90	.....	330 31 18.32	+ 1.06	+ 2.63	- 33.78	+ 9 26 30.05
		E	...	21 42 48.5	3 13.9	50.10	49.85	.....	29 28 18.72	+ 1.01	- 31.98	+ 33.79	
12	π Pegasi	E	2.5	22 6 ...	...	49.50	49.55	25.594	6 11 16.58	+ 1.31	+ 0.22	+ 6.51	+ 32 42 56.70
		W	...	...	...	50.15	50.40	25.594	353 46 49.28	+ 2.05	- 0.22	- 6.51	
13	32 Pegasi	E	2.5	22 14 8.7	2 51.1	49.75	49.60	.....	11 4 15.55	+ 0.70	- 57.19	+ 11.74	+ 27 51 19.55
		W	...	22 18 55.7	1 55.9	50.30	50.55	.....	348 55 20.45	+ 1.50	+ 26.25	- 11.73	
14	29 H. Camelop.	W	3	10 11 12.0	4 43.8	49.00	48.95	.....	45 47 5.40	+ 0.11	- 4.38	+ 1 1.55	+ 84 43 44.69
		E	...	10 15 44.0	0 11.8	50.65	50.45	.....	314 12 6.52	+ 1.75	+ 0.01	- 1 1.57	
15	32 H. Cephei s. P.	E	3	10 19 45.0	1 21.1	50.70	50.50	.....	304 34 26.82	+ 1.75	- 0.26	- 1 26.86	+ 85 38 9.76
		W	...	10 24 14.0	3 7.9	49.80	49.70	.....	55 24 39.35	+ 0.89	+ 1.39	+ 1 26.88	
16	226 B. Cephei s. P.	W	3	10 28 20.0	2 22.1	49.70	49.75	.....	65 17 31.15	+ 0.90	+ 2.32	+ 2 9.88	+ 75 44 33.52
		E	...	10 32 20.0	1 37.9	50.80	50.50	.....	294 41 33.88	+ 1.84	- 1.10	- 2 9.91	
17	ε Cephei s. P.	W	3.5	10 43 42.0	2 40.9	49.60	49.45	.....	75 18 4.42	+ 0.70	+ 4.67	+ 3 45.61	+ 65 42 21.98
		E	4	10 48 34.0	2 11.1	50.75	50.50	.....	284 40 59.75	+ 1.79	- 3.10	- 3 45.66	
18	36 H. Cephei s. P.	E	3	10 53 8.0	2 12.1	50.60	50.40	.....	302 46 59.98	+ 1.67	- 0.94	- 1 33.02	+ 83 50 36.47
		W	...	10 57 30.0	2 9.9	49.70	49.45	.....	57 12 6.62	+ 0.76	+ 0.91	+ 1 33.03	
19	π Cephei s. P.	W	3	11 1 56.0	3 2.8	49.60	49.40	.....	66 9 11.70	+ 0.65	+ 4.05	+ 2 15.28	+ 74 52 45.49
		E	...	11 6 56.0	1 57.2	50.60	50.30	.....	293 49 51.42	+ 1.65	- 1.66	- 2 15.33	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
30 10 55	28.7	...	...	12. Instrument in meridian, observation at I with movable thread.	1	359 59 36.16	- 38.47
1 21 40	43.1	43.6	29.756		2	35.64	...
1 21 56	41.9	...	...		3	30.53	- 25.73
22 12	42.6	...	...		4	35.26	...
22 24	42.3	...	...		5	34.84	...
22 35	41.6	42.8	29.704		6	36.06	...
22 47	40.9	...	...		7	35.54	- 37.73
22 50	40.2	...	...		8	36.22	...
23 7	39.6	...	...		9	36.58	38.50
23 25	38.8	...	...		10	36.02	...
23 36	...	40.3	29.768		11	34.88	...
6 21 41	34.0	36.3	29.844		12	34.59	...
22 10	33.1	...	...		13	33.64	- 30.14
22 17	32.7	...	...		14	34.70	...
22 33	...	34.7	29.834	Notes.	15	34.98	- 39.01
10 14	28.3	...	...	4 W. One microscope reading changed from 52".7 to 47".3.	16	34.48	...
10 23	27.8	...	...	11. Clouds.	17	34.09	...
10 31	27.7	29.4	29.564		18	34.50	- 38.90
10 47	27.6	...	...		19	31.88	...
10 56	27.6	...	...		
11 11	27.2	...	...		

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	o Cephei s. p.	E W	4	11 12 12.0 11 16 46.0	2 36.9 1 57.1	50.60 49.50	50.40 49.35	..... .....	286 34 2.30 73 25 8.38	+ 1.70 + 0.57	- 4.15 + 2.31	-3 19.67 +3 19.68	+67 35 47.91
2	γ Cephei s. p.	E W	3.5	11 32 32.0 11 37 16.0	3 2.1 1 41.9	50.60 49.55	50.35 49.45	..... .....	296 3 22.40 63 55 48.50	+ 1.66 + 0.67	- 3.49 + 1.09	-2 2.42 +2 2.41	+77 6 26.03
3	41 H. Cephei s. p.	W E	3	11 41 28.0 11 46 25.0	1 59.8 2 57.2	49.55 50.35	49.45 50.05	..... .....	73 43 52.12 286 15 20.18	+ 0.68 + 1.37	+ 2.45 - 5.36	+3 23.55 -3 23.46	+67 17 0.25
4	December 8, L. π ² Cygni	E W	2	21 43 ..... .....	..... .....	48.65 48.70	49.65 49.70	25.142 25.142	350 2 20.18 9 56 24.75	+ 2.14 + 2.20	+ 0.38 - 0.38	- 10.18 + 10.18	+48 52 28.83
5	μ Piscis Australis	W E	4	21 59 52.0 22 4 20.0	3 1.7 1 26.3	47.75 49.00	48.50 49.75	..... .....	287 39 52.60 72 19 8.20	+ 0.42 + 1.66	+12.26 - 2.77	-3 0.56 +3 0.63	-33 27 14.79
6	29 H. Camelop. s. p.	W E	2	22 11 4.0 22 15 42.0	4 52.4 0 14.4	48.50 48.80	49.45 49.55	..... .....	56 18 58.90 303 40 4.92	+ 1.25 + 1.49	+ 4.01 - 0.01	+1 27.15 -1 27.18	+84 43 47.25
7	32 H. Cephei	E W	2.5	22 19 9.0 22 23 12.0	1 56.8 2 6.2	48.55 48.50	49.60 49.65	..... .....	313 17 44.28 46 41 25.45	+ 1.38 + 1.36	+ 0.61 - 0.71	-1 1.73 +1 1.76	+85 38 8.37
8	10 Lacertæ	W E	2.5	22 35 ..... .....	..... .....	48.35 48.90	49.05 49.70	27.163	359 36 20.60 0 21 16.75	+ 0.22 + 0.87	- 0.27 + 0.27	- 0.37 + 0.37	+38 33 34.69
9	λ Aquarii	E W	.....	22 45 2.0 22 48 45.0	2 41.4 1 1.6	49.25 48.90	50.00 49.75	..... .....	46 59 9.68 313 0 12.02	+ 1.92 + 1.65	-14.96 + 2.18	+1 2.47 -1 2.47	- 8 5 6.15
10	36 H. Cephei	W E	2	22 52 36.0 22 57 22.0	2 44.0 2 2.0	48.55 49.20	49.35 49.80	..... .....	44 53 58.22 315 5 12.72	+ 1.26 + 1.81	- 1.73 + 0.96	+ 58.12 - 58.13	+83 50 35.97
11	π Cephei	E W	2.5	23 2 12.0 23 7 2.0	2 46.9 2 3.1	49.30 48.75	50.00 49.75	..... .....	324 2 44.22 35 56 23.28	+ 1.94 + 1.51	+ 5.25 - 2.86	- 42.33 + 42.33	+74 52 44.30
12	o Cephei	W E	2.5	23 11 43.0 23 17 8.0	3 6.0 2 19.0	48.65 49.00	49.75 49.80	..... .....	28 39 44.38 331 19 28.55	+ 1.50 + 1.70	-11.66 + 6.51	+ 31.92 - 31.92	+67 35 47.36
13	λ Draconis s. p.	E W	4	23 24 44.0 23 28 38.0	1 4.4 2 49.6	48.75 48.80	49.85 49.95	..... .....	288 48 44.48 71 10 19.95	+ 1.57 + 1.64	- 0.64 + 4.44	-2 49.94 +2 49.99	+69 51 3.01
14	γ Cephei	W E	2.5	23 32 37.0 23 36 38.0	2 57.2 1 3.8	48.95 49.15	50.00 50.05	..... .....	38 10 1.90 321 49 11.40	+ 1.80 + 1.90	- 4.81 + 0.62	+ 45.96 - 45.96	+77 6 25.15
15	41 H. Cephei	E W	2.5	23 40 55.0 23 45 33.0	2 32.9 2 5.1	49.00 49.00	50.15 50.30	..... .....	331 38 14.18 28 20 52.38	+ 1.90 + 1.94	+ 8.06 - 5.40	- 31.56 + 31.56	+67 17 0.66
16	κ ² Sculptoris	W E	3.5	0 3 56.0 0 8 54.0	2 53.3 2 4.7	48.20 49.60	48.65 50.35	..... .....	292 46 30.05 67 12 30.82	+ 0.69 + 2.27	+12.16 - 6.30	-2 18.49 +2 18.53	-28 19 53.75
17	44 Piscium	E W	2	0 18 14.0 0 22 59.0	2 22.5 2 22.5	50.10 49.10	50.60 49.65	..... .....	37 29 30.95 322 29 36.08	+ 2.69 + 1.00	-14.15 +14.15	+ 44.97 - 45.00	+ 1 24 47.94
18	h Piscium	E W	3	0 50 12.7 0 54 42.5	2 34.0 1 55.8	50.85 49.90	51.10 49.90	..... .....	10 26 37.82 349 32 49.15	+ 3.30 + 2.20	-48.80 +27.60	+ 10.84 - 10.84	+28 28 49.19
19	c Piscium	W E	3	1 2 15.0 1 8 1.5	1 18.4 4 28.1	48.75 50.70	48.50 50.80	..... .....	326 13 41.50 33 46 17.60	+ 0.93 + 3.06	+ 4.67 - 54.63	- 39.32 + 39.34	+ 5 8 47.91
20	48 Ceti	E W	3	1 22 8.0 1 27 7.0	2 59.5 1 59.5	50.95 49.75	51.10 49.70	..... .....	61 0 43.00 298 58 32.28	+ 3.35 + 2.02	-14.48 + 6.42	+1 45.98 -1 46.01	-22 7 24.86

Time	Ther- (88)	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below					No.	Zenith point.	Red. to 1904 o.
4 3 m	27.2	28.6	29.528	Instrument in meridian, observation at I with movable thread.					1	359 59 35.56	.....
6 11 45	27.2	28.7	29.528	Instrument in meridian; W. observation at IX with movable thread; E. observation at IX with fixed thread.					2	35.41	.....
11 47	27.6	42.3	29.529						3	35.70	.....
12 41	40.6	.....	.....						4	36.16	.....
12 43	39.6	.....	.....						5	36.22	9.97
12 44	39.4	.....	.....						6	35.26	.....
12 45	39.2	.....	.....						7	36.20	-39.06
12 46	38.6	40.3	29.446						8	36.24	.....
12 47	38.6	.....	.....						9	36.24	.....
12 48	38.4	.....	.....						10	36.62	-39.03
12 49	38.4	.....	.....						11	36.67	.....
12 50	38.4	.....	.....						12	35.49	.....
12 51	37.6	.....	.....						13	35.74	.....
12 52	37.6	.....	.....						14	36.40	.....
12 53	37.6	.....	.....						15	36.51	.....
12 54	37.6	34.8	29.420	Note.					16	34.86	- 8.61
0 7	37.6	.....	.....	19. Clouds.					17	35.69	.....
0 9 1	36.7	.....	.....						18	35.64	- 21.46
0 9 3	36.5	37.2	29.468						19	36.58	-16.89
1 1 1	37.4	.....	.....						20	36.28	- 7.40
1 2 1	35.7	32.3	29.440								

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
December 12, L.													
1	0 Pegasi	E	3	<i>h m s</i> 22 2 28.0	<i>m s</i> 3 0.8	<i>d</i> 50.75	<i>d</i> 51.70	<i>r</i>	<i>° ' "</i> 33 10 42.05	<i>"</i> + 2.43	<i>"</i> - 25.21	<i>' "</i> + 39.39	<i>° ' "</i> + 5 43 53.50
		W	...	22 7 34.0	2 5.2	49.05	49.70	.....	326 48 39.05	+ 0.55	+ 12.09	- 39.42	
2	32 H. Cephei	W	2.5	22 19 28.0	1 37.2	48.55	49.10	.....	46 41 22.85	0.00	- 0.42	+ 1 4.00	+ 85 38 7.54
		E	...	22 23 16.0	2 10.8	50.25	50.75	.....	313 17 46.30	+ 1.72	+ 0.76	- 1 4.03	
3	226 B. Cephei	W	2.5	22 28 18.0	2 24.5	48.65	49.30	.....	36 48 8.85	+ 0.13	- 3.64	+ 45.23	+ 75 44 31.62
		E	...	22 32 54.0	2 11.5	50.15	50.75	.....	323 11 1.30	+ 1.66	+ 3.02	- 45.25	
4	6 H ¹ . Draconis s. p.	E	3.5	22 49 2.0	3 22.9	50.00	51.10	.....	297 13 19.20	+ 1.75	- 3.99	- 1 57.10	+ 78 16 27.25
		W	...	22 54 12.0	1 47.1	48.80	49.45	.....	62 45 53.40	+ 0.32	+ 1.11	+ 1 57.13	
5	π Cephei	W	3	23 2 16.0	2 43.1	48.65	49.45	.....	35 56 24.85	+ 0.22	- 5.02	+ 43.89	+ 74 52 44.57
		E	...	23 7 17.0	2 17.9	50.15	51.10	.....	324 2 46.70	+ 1.82	+ 3.59	- 43.91	
6	σ Cephei	E	3	23 12 5.0	2 44.4	50.00	51.10	.....	331 19 26.78	+ 1.75	+ 9.11	- 33.11	+ 67 35 47.22
		W	...	23 16 58.0	2 8.6	48.65	49.25	.....	28 39 37.88	+ 0.14	- 5.57	+ 33.11	
7	λ Draconis s. p.	W	3.5	23 22 56.0	2 53.3	48.50	49.15	.....	71 10 13.60	- 0.03	+ 4.64	+ 2 56.20	+ 69 51 3.78
		E	...	23 27 50.0	2 0.7	50.05	50.95	.....	288 48 52.15	+ 1.70	- 2.25	- 2 56.23	
8	γ Cephei	E	2.5	23 32 35.0	2 59.4	50.25	51.00	.....	321 49 7.32	+ 1.83	+ 4.93	- 47.63	+ 77 6 25.85
		W	...	23 37 26.0	1 51.6	48.65	49.20	.....	38 9 58.92	+ 0.11	- 1.91	+ 47.63	
9	41 H. Cephei	W	2.5	23 41 9.0	2 19.3	48.65	49.20	.....	28 20 53.82	+ 0.09	- 6.69	+ 32.71	+ 67 17 0.62
		E	...	23 45 27.0	1 58.7	50.60	51.10	.....	331 38 17.90	+ 2.05	+ 4.86	- 32.73	
December 13, L.													
10	π ² Cygni	W	2.5	21 43 ....	.....	48.80	50.05	26.797	9 55 18.85	+ 0.36	- 0.38	+ 10.61	+ 48 52 28.32
		E	...	.....	.....	49.30	50.50	26.797	350 1 15.60	+ 0.84	+ 0.38	- 10.61	
11	θ Pegasi	W	2.5	22 2 23.0	3 6.0	48.85	49.75	.....	326 48 25.42	+ 0.93	+ 26.69	- 39.62	+ 5 43 53.99
		E	...	22 7 19.5	1 50.5	49.50	50.05	.....	33 10 26.90	+ 1.72	- 9.42	+ 39.64	
12	σ Aquarii	E	2.5	22 22 26.5	3 15.2	50.50	51.45	.....	50 3 50.45	+ 2.68	- 20.68	+ 12.46	- 11 9 52.03
		W	...	22 26 56.0	1 14.3	49.80	50.30	.....	309 55 35.18	+ 1.73	+ 3.00	- 12.46	
13	10 Lacertæ	E	2.5	22 35 ....	.....	50.20	50.80	26.138	0 20 22.70	+ 2.89	+ 0.27	+ 0.38	+ 38 33 33.96
		W	...	.....	.....	49.75	50.40	26.138	359 36 58.95	+ 2.47	- 0.27	- 0.38	
14	λ Aquarii	W	2.5	22 45 9.0	2 35.1	48.40	49.35	.....	313 0 2.92	+ 0.55	+ 13.82	- 1 5.12	- 8 5 7.24
		E	...	22 50 5.0	2 20.9	50.00	50.95	.....	46 59 4.20	+ 2.15	- 11.41	+ 1 5.12	
15	σ Andromedæ	E	3	22 57 ....	.....	50.30	51.25	25.754	357 5 7.20	+ 3.19	+ 0.30	- 3.08	+ 41 49 9.30
		W	...	.....	.....	49.45	50.25	25.754	2 52 47.80	+ 2.24	- 0.30	+ 3.08	
16	11 G. Sculptoris	W	3	23 14 54.0	1 22.3	48.25	49.00	.....	293 36 1.72	+ 0.29	+ 2.78	- 2 18.68	- 27 30 32.97
		E	...	23 18 42.0	2 25.7	50.00	50.90	.....	66 23 13.32	+ 2.12	- 8.72	+ 2 18.73	
17	15 Andromedæ	E	2	23 30 ....	.....	50.70	51.85	25.843	359 11 13.10	+ 3.70	+ 0.28	- 0.85	+ 39 42 56.97
		W	...	.....	.....	49.35	50.05	25.843	0 46 34.12	+ 2.08	- 0.28	+ 0.85	
18	i ¹ Aquarii	W	3.5	23 36 46.0	2 35.3	48.70	49.30	.....	302 17 21.62	+ 0.66	+ 11.46	- 1 36.25	- 18 48 21.12
		E	...	23 41 32.0	2 10.7	50.30	51.00	.....	57 41 42.62	+ 2.35	- 8.12	+ 1 36.27	
19	ρ Cassiopeiæ	E	2.5	23 47 1.5	2 29.6	50.50	51.15	.....	341 56 23.60	+ 2.49	+ 16.70	- 19.90	+ 56 58 29.98
		W	...	23 52 8.5	2 24.4	49.50	49.95	.....	18 2 43.72	+ 1.38	- 15.56	+ 19.91	
20	κ ² Sculptoris	E	3.5	0 4 6.0	2 43.9	50.70	51.60	.....	67 12 30.58	+ 2.83	- 10.88	+ 2 24.72	- 28 19 55.14
		W	...	0 8 58.0	2 8.1	49.50	49.80	.....	292 46 40.40	+ 1.30	+ 6.64	- 2 24.76	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>								<i>° ' "</i>	<i>"</i>
12 23 5	25.0	26.7	29.513	10. Instrument in meridian, observation at IX with movable thread.						1	359 59 35.40	
22 22	24.0	...	...	13, 15, 17. Instrument in meridian, observation at I with movable thread.						2	45 59	- 48.90
22 31	23.4	...	...							3	35 05	
22 52	23.4	...	...							4	35 91	
23 5	22.7	25.0	29.518							5	36 07	
23 15	22.7	...	...							6	35 04	
23 36	22.6	...	...							7	34 89	
23 48	22.4	24.1	29.531							8	35 60	
13 21 41	29.0	30.7	29.863							9	36 00	
22 5	28.0	...	...							10	36 92	
22 25	27.2	...	...							11	36 13	
22 48	26.7	...	...							12	36 18	
22 48	26.7	...	...							13	35 70	
23 7	26.2	...	...							14	36 12	
23 17	25.7	26.9	29.888							15	36 72	
23 40	25.4	...	...							16	35 78	10.00
23 55	24.8	...	...							17	36 64	32.00
0 7	24.2	25.6	29.896							18	35 30	
										19	36 12	15.00
										20	35 42	8.13

Note.

4 E. One microscope reading increased 10"; W. one microscope reading increased 20".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	44 Piscium	W	3	0 17 55.0	2 42.2	48.80	49.40	.....	322 29 34.85	+ 0.76	+ 18.33	- 46.90	+ 1 24 47.66
		E	...	0 22 48.7	2 11.5	50.60	51.50	.....	37 29 27.52	+ 2.76	- 12.05	+ 46.90	
2	82 B. Ceti	W	3	0 29 50.0	2 42.9	49.00	49.45	.....	295 48 38.08	+ 0.87	+ 11.31	- 2 5.85	- 25 17 34.94
		E	...	0 35 6.0	2 33.1	50.70	51.40	.....	64 10 29.10	+ 2.73	- 9.99	+ 2 5.85	
3	147 B. Piscium	E	2.5	0 40 28.0	3 1.2	51.20	51.80	.....	34 7 2.82	+ 3.21	- 24.75	+ 41.44	+ 4 47 30.61
		W	...	0 44 46.0	1 16.8	49.70	49.95	.....	325 52 26.05	+ 1.48	+ 4.44	- 41.43	
4	<i>h</i> Piscium	W	2.5	0 49 49.7	2 57.0	48.95	49.40	.....	349 32 15.05	+ 0.81	+ 1 4.88	- 11.29	+ 28 28 49.23
		E	...	0 54 51.5	2 4.2	50.70	51.35	.....	10 26 22.15	+ 2.70	- 31.75	+ 11.29	
5	<i>e</i> Piscium	E	3	1 2 49.0	0 45.0	51.05	51.60	.....	33 45 23.62	+ 3.04	- 1.54	+ 40.94	+ 5 8 47.42
		W	...	1 5 42.0	2 8.0	49.40	49.85	.....	326 13 34.68	+ 1.30	+ 12.46	- 40.95	
6	<i>l</i> Piscium	W	3	1 13 11.7	2 46.2	48.55	48.90	.....	349 18 9.65	+ 0.40	+ 55.60	- 11.57	+ 28 14 34.76
		E	...	1 18 18.5	2 20.6	50.75	51.40	.....	10 40 43.58	+ 2.77	- 39.87	+ 11.58	
7	<i>μ</i> Piscium	E	3	1 22 38.5	2 39.5	51.00	51.45	.....	33 15 17.78	+ 2.94	- 19.59	+ 40.23	+ 5 39 11.70
		W	...	1 27 21.0	2 3.0	49.10	49.55	.....	326 43 58.95	+ 1.01	+ 11.65	- 40.24	
8	32 H. Cephei s. p.	W	2.5	10 18 18.0	2 46.9	49.50	50.15	.....	55 24 36.20	+ 0.61	+ 1.09	+ 1 30.74	+ 85 38 11.08
		E	...	10 23 12.0	2 7.1	49.05	50.35	.....	304 34 34.80	+ 0.79	- 0.63	- 1 30.76	
9	226 B. Cephei s. p.	E	3.5	10 28 10.0	2 32.5	49.70	50.45	.....	294 41 43.72	+ 0.90	- 2.67	- 2 15.72	+ 75 44 34.34
		W	...	10 33 6.0	2 23.5	50.30	50.65	.....	65 17 24.72	+ 1.30	+ 2.37	+ 2 15.76	
10	6 H ¹ . Draconis	W	3	10 49 44.0	2 41.3	49.40	49.80	.....	39 19 56.35	+ 0.42	- 3.54	+ 51.45	+ 78 16 25.64
		E	...	10 54 50.0	2 24.7	49.40	49.75	.....	320 39 15.02	+ 0.38	+ 2.85	- 51.46	
11	<i>π</i> Cephei s. p.	E	4	11 2 6.0	2 53.2	49.40	49.90	.....	293 50 2.05	+ 0.47	- 3.63	- 2 21.39	+ 74 52 46.01
		W	...	11 7 14.0	2 14.8	49.75	50.25	.....	66 9 7.70	+ 0.80	+ 2.20	+ 2 21.38	
12	<i>σ</i> Cephei s. p.	W	3.5	11 12 2.0	2 47.5	49.35	49.80	.....	73 24 56.10	+ 0.36	+ 4.73	+ 3 28.54	+ 67 35 49.70
		E	...	11 17 10.0	2 20.5	49.30	49.85	.....	286 34 13.95	+ 0.41	- 3.33	- 3 28.50	
13	<i>λ</i> Draconis	E	3	11 23 0.0	2 49.6	49.80	50.30	.....	329 4 18.70	+ 0.83	+ 8.18	- 37.58	+ 69 51 2.90
		W	...	11 27 40.0	1 50.4	49.80	50.25	.....	30 54 47.60	+ 0.82	- 3.47	+ 37.58	
14	<i>γ</i> Cephei s. p.	W	4	11 32 52.0	2 42.5	49.50	50.00	.....	63 55 41.38	+ 0.56	+ 2.78	+ 2 7.74	+ 77 6 27.02
		E	...	11 37 46.0	2 11.5	49.25	49.75	.....	296 3 29.15	+ 0.31	- 1.82	- 2 7.74	
15	41 H. Cephei s. p.	E	4	11 41 48.0	1 40.4	49.60	50.20	.....	286 15 27.72	+ 0.70	- 1.72	- 3 32.52	+ 67 17 2.06
		W	...	11 46 28.0	2 59.6	49.65	50.25	.....	73 43 37.88	+ 0.77	+ 5.50	+ 3 32.50	
16	128 H ¹ . Camelop.	W	2.5	11 57 8.0	2 43.5	49.30	49.70	.....	47 9 42.52	+ 0.31	- 1.05	+ 1 7.62	+ 86 6 30.66
		E	...	12 2 8.0	2 16.5	49.30	49.80	.....	312 49 28.05	+ 0.35	+ 0.73	- 1 7.64	
17	318 B. Cephei s. p.	E	3.5	12 7 50.0	3 8.3	49.45	49.80	.....	295 22 47.70	+ 0.40	- 3.90	- 2 11.67	+ 76 25 40.56
		W	...	12 12 18.0	1 19.7	49.65	50.10	.....	64 36 25.00	+ 0.65	+ 0.70	+ 2 11.65	
18	Dec. 14. L. 31 Cephei	E	2.5	22 30 27.0	3 4.5	49.15	49.55	.....	325 40 8.15	+ 0.72	+ 7.44	- 41.85	+ 73 9 19.04
		W	...	22 35 37.0	2 5.5	49.50	49.65	.....	34 12 59.78	+ 0.91	- 3.44	+ 41.89	
19	6 H ¹ Draconis s. p.	W	2.5	22 49 28.0	2 57.5	49.05	49.45	.....	62 45 47.38	+ 0.60	+ 3.06	+ 1 59.58	+ 78 16 28.34
		E	...	22 54 42.0	2 16.5	48.65	49.20	.....	297 13 21.00	+ 0.26	- 1.81	- 1 59.65	
20	59 Pegasi	E	2.5	23 4 4.5	2 57.0	49.10	49.85	.....	30 42 22.18	+ 0.77	- 25.76	+ 36.72	+ 8 12 18.56
		W	3	23 9 4.0	2 2.5	49.95	50.35	.....	329 17 0.52	+ 1.50	+ 12.34	- 36.72	

Time.	Ther- m.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1904 v.
<i>h m</i>			<i>in.</i>						<i>° ' "</i>	<i>"</i>
1 11	71.4							1	189 59 36.08	
2 11	71.4							2	36.66	
3 11	71.4							3	36.64	
4 51	71.1							4	36.62	- 21.81
5 11	70.6							5	36.58	- 16.59
6 11	70.4							6	36.52	- 22.05
7 11	70.1							7	36.46	- 12.11
8 11	70.1	24.1	30.95					8	36.42	- 18.86
9 11	70.1							9	35.19	
10 11	70.1							10	35.74	
11 11	70.1							11	31.29	
12 11	70.1							12	36.13	
13 11	70.1							13	36.11	
14 11	70.1							14	36.18	
15 11	70.1							15	35.42	
16 11	70.1							16	35.44	- 42.14
17 11	70.1							17	35.06	- 36.33
18 11	70.1							18	36.80	- 38.40
19 11	70.1							19	35.66	
20 11	70.1							20	35.78	- 22.62

Note

E. Clock time increased 12.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	249 B. Ursæ Majoris s. P.	W	3	23 15 6.0	2 10.9	49.25	49.85	.....	76 9 19.18	+ 0.89	+ 3.18	+4 7.23	+64 50 48.16
		E	...	23 19 40.0	2 23.1	48.55	49.10	.....	283 49 51.20	+ 0.18	- 3.80	-4 7.37	
2	39 H. Cephei	E	2	23 25 8.0	2 55.1	49.05	49.75	.....	312 8 40.40	+ 0.71	+ 0.98	-1 8.34	+86 47 18.28
		W	...	23 30 32.0	2 28.9	50.20	50.60	.....	47 50 27.52	+ 1.74	- 0.71	+1 8.36	
3	3 Draconis s. P.	W	3.5	23 34 30.0	2 44.4	49.50	50.05	.....	73 44 44.48	+ 1.10	+ 4.61	+3 30.13	+67 15 59.87
		E	...	23 39 20.0	2 5.6	48.60	49.40	.....	286 14 26.05	+ 0.30	- 2.69	-3 30.20	
4	Groombridge 4163	E	3.5	23 47 40.0	2 39.7	49.05	49.75	.....	325 2 20.72	+ 0.70	+ 5.24	- 43.31	+73 53 9.76
		W	...	23 52 44.0	2 24.3	49.80	50.45	.....	34 56 48.98	+ 1.46	- 4.28	+ 43.32	
5	128 H ¹ . Camelop. s. P.	W	3	23 57 18.0	2 33.9	49.55	50.05	.....	54 56 15.18	+ 1.11	+ 0.83	+1 28.23	+86 6 33.96
		E	...	0 2 38.0	2 46.1	49.15	49.60	.....	305 2 55.22	+ 0.70	- 0.97	-1 28.27	
6	318 B. Cephei	E	2.5	0 8 20.0	2 38.4	49.35	50.00	.....	322 29 57.30	+ 1.04	+ 4.10	- 47.56	+76 25 37.36
		W	...	0 13 2.0	2 3.6	49.75	50.35	.....	37 29 9.75	+ 1.39	- 2.50	+ 47.57	
7	12 Ceti	W	3.5	0 21 46.0	3 30.8	48.95	49.45	.....	316 35 51.15	+ 0.55	+27.36	- 58.68	- 4 28 59.47
		E	...	0 25 49.0	0 32.2	49.50	50.25	.....	43 22 53.45	+ 1.20	- 0.64	+ 58.71	
8	82 B. Ceti	E	3	0 29 44.0	2 49.1	50.00	50.45	.....	64 10 29.38	+ 1.55	-12.18	+2 8.00	-25 17 34.48
		W	...	0 34 24.0	1 50.9	49.35	49.60	.....	295 48 46.42	+ 0.80	+ 5.24	-2 8.07	
9	147 B. Piscium	W	3.5	0 40 56.0	2 33.4	48.80	49.00	.....	325 52 14.48	+ 0.20	+17.74	- 42.16	+ 4 47 30.47
		E	...	0 45 35.0	2 5.6	49.95	50.50	.....	34 6 50.88	+ 1.57	-11.89	+ 42.16	
10	26 Ceti	E	3	0 56 27.0	2 34.3	50.80	51.25	.....	38 2 53.38	+ 2.38	-16.39	+ 48.73	+ 0 51 24.42
		W	...	1 1 20.0	2 18.7	49.65	49.70	.....	321 56 18.05	+ 0.99	+13.24	- 48.74	
11	1 Piscium	E	3	1 13 6.5	2 51.6	50.95	51.25	.....	10 41 1.00	+ 2.47	-59.36	+ 11.76	+28 14 35.10
		W	...	1 17 48.5	1 50.4	49.85	49.95	.....	349 18 39.50	+ 1.22	+24.59	- 11.75	
12	μ Piscium	W	3	1 22 37.0	2 41.2	49.05	49.15	.....	326 43 53.22	+ 0.46	+20.00	- 40.83	+ 5 39 12.33
		E	...	1 27 32.0	2 13.8	50.80	51.10	.....	33 15 12.22	+ 2.32	-13.78	+ 40.83	
13	December 15, L. 31 Cephei s. P.	E	3.5	10 32 30.0	1 1.4	50.80	51.10	.....	292 6 39.62	+ 1.39	- 0.50	-2 29.52	+73 9 19.87
		W	...	10 36 46.0	3 14.6	49.85	49.95	.....	67 52 23.02	+ 0.32	+ 5.02	+2 29.51	
14	249 B. Ursæ Majoris	E	3	11 14 5.0	3 12.0	50.90	51.45	.....	334 4 20.18	+ 1.62	+15.21	- 29.74	+64 50 44.95
		W	2	11 19 18.5	2 1.5	49.90	50.20	.....	25 54 39.68	+ 0.47	- 6.09	+ 29.74	
15	39 H. Cephei s. P.	W	2	11 24 51.0	3 11.5	49.75	50.05	.....	54 15 32.45	+ 0.34	+ 1.07	+1 24.94	+86 47 20.23
		E	3	11 30 20.0	2 17.5	50.75	51.05	.....	305 43 36.78	+ 1.36	- 0.55	-1 24.96	
16	3 Draconis	E	2.5	11 34 39.0	2 35.7	51.00	51.25	.....	331 39 16.48	+ 1.59	+ 8.37	- 33.03	+67 15 57.65
		W	...	11 39 41.0	2 26.3	49.95	50.05	.....	28 19 49.25	+ 0.45	- 7.40	+ 33.03	
17	Groombridge 4163 S. P.	W	4	11 47 32.0	2 47.8	49.75	49.70	.....	67 8 36.68	+ 0.14	+ 3.60	+2 24.66	+73 53 12.21
		E	...	11 52 58.0	2 38.2	51.00	51.20	.....	292 50 29.25	+ 1.54	- 3.20	-2 24.71	
18	128 H ¹ . Camelop.	E	2.5	11 57 24.0	2 28.6	51.05	51.30	.....	312 49 25.02	+ 1.64	+ 0.87	-1 6.07	+86 6 30.45
		W	...	12 2 22.0	2 29.4	49.75	49.75	.....	47 9 43.60	+ 0.19	- 0.88	+1 6.07	
19	December 16, L. 31 Cephei	W	3	22 30 56.0	2 35.6	49.50	50.10	.....	34 13 1.10	+ 0.92	- 5.29	+ 40.66	+73 9 18.79
		E	...	22 35 41.0	2 9.4	48.80	49.60	.....	325 46 9.90	+ 0.32	+ 3.66	- 40.68	
20	α Piscis Australis	E	3	22 49 46.0	2 42.9	49.50	50.20	.....	69 0 8.48	+ 0.95	-10.43	+2 35.12	-30 7 42.35
		W	...	22 55 2.0	2 33.1	49.45	50.35	.....	290 59 1.02	+ 1.02	+ 9.21	-2 35.21	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
14 23 18	20.9	...	...						1	359 59 35.34	...
23 28	21.4	...	...						2	35.33	...
23 37	20.7	22.3	30.079						3	36.89	...
23 50	21.0	...	...						4	36.42	...
0 1	20.3	...	...						5	36.02	+37.16
0 11	20.7	...	...						6	35.54	-36.37
0 19	20.1	21.7	30.080						7	36.55	...
0 33	19.0	...	...						8	35.57	...
0 44	18.9	...	...						9	36.49	...
1 0	18.6	...	...						10	35.82	-15.36
1 16	18.6	...	...						11	35.16	-22.65
1 26	18.6	20.3	30.074						12	37.22	-15.23
15 10 35	21.7	22.7	29.726						13	34.43	-38.32
11 17	21.6	...	...						14	35.54	...
11 28	21.2	...	...						15	35.72	...
11 38	21.2	22.1	29.744						16	34.77	...
11 50	20.7	...	...						17	33.98	...
12 6	20.7	21.6	29.748						18	35.22	+37.29
16 22 34	34.4	35.8	29.884						19	35.30	-38.28
22 53	33.3	...	...						20	35.08	...

Note.
13. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	59 Pegasi	W E	2.5 ...	23 4 6.5 23 9 11.0	2 55.2 2 9.3	49.05 49.15	49.70 49.90	..... .....	329 16 46.80 30 42 10.98	+ 0.48 + 0.62	+25.24 -13.75	- 35.65 + 35.66	+ 8 12 18.37
2	249 B. Ursæ Majoris s. p.	E W	4 ...	23 14 28.0 23 19 28.0	2 49.4 2 10.6	49.05 49.75	50.45 50.60	..... .....	283 49 41.98 76 9 25.68	+ 0.87 + 1.30	- 5.33 + 3.17	-3 59.79 +3 59.89	+64 50 47.15
3	39 H. Cephei	W E	2 ...	23 25 14.0 23 29 50.0	2 48.6 1 47.4	49.50 49.20	50.60 50.00	..... .....	47 50 30.12 312 8 38.10	+ 1.16 + 0.71	- 0.91 + 0.37	+1 6.40 -1 6.44	+86 47 18.71
4	3 Draconis s. p.	E W	3.5 ...	23 35 42.0 23 40 2.0	1 32.8 2 47.2	49.40 49.70	50.10 50.80	..... .....	286 14 15.22 73 44 49.48	+ 0.89 + 1.37	- 1.47 + 4.77	-3 24.07 +3 24.10	+67 15 58.73
5	Groombridge 4163	W E	2.5 ...	23 47 31.0 23 52 26.0	2 48.8 2 6.2	49.60 49.25	50.30 50.00	..... .....	34 56 51.90 325 2 20.02	+ 1.06 + 0.73	- 5.86 + 3.27	+ 42.07 - 42.06	+73 53 10.29
6	128 H ¹ . Camelop. s. p.	E W	2.5 ...	23 57 34.0 0 2 22.0	2 18.8 2 29.2	49.30 49.70	50.05 50.40	..... .....	305 2 51.15 54 56 18.05	+ 0.78 + 1.16	- 0.68 + 0.78	-1 25.59 +1 25.57	+86 6 33.36
7	318 B. Cephei	W E	2 ...	0 8 12.0 0 13 14.0	2 46.5 2 15.5	49.55 49.15	50.10 49.75	..... .....	37 29 14.28 322 29 56.25	+ 0.95 + 0.57	- 4.53 + 3.00	+ 46.13 - 46.14	+76 25 38.27
8	κ Draconis s. p.	E W	3.5 ...	0 27 0.0 0 31 56.0	2 28.9 2 27.1	49.30 49.75	50.10 51.00	..... .....	289 16 13.32 70 42 53.98	+ 0.84 + 1.40	- 3.36 + 3.28	-2 50.67 +2 50.72	+70 18 28.64
9	ζ Andromedæ	W E	3 ...	0 39 26.2 0 44 30.3	2 58.0 2 6.1	49.35 49.40	50.00 50.30	..... .....	344 48 53.95 15 9 53.58	+ 0.78 + 0.98	+47.01 -23.60	- 16.35 + 16.36	+23 45 5.73
10	43 H. Cephei	E W	2.5 ...	0 53 4.0 0 57 42.0	2 53.5 1 44.5	49.35 49.95	50.40 51.10	..... .....	313 10 48.78 46 48 17.60	+ 0.98 + 1.64	- 1.30 - 0.47	-1 4.17 +1 4.17	+85 45 4.71
11	ζ ¹ Piscium	W E	3 ...	1 6 12.0 1 11 9.0	2 40.0 2 17.0	49.35 49.35	50.40 50.45	..... .....	328 8 55.92 31 50 8.52	+ 0.98 + 0.99	+20.43 -14.98	- 37.45 + 37.45	+ 7 4 20.64
12	48 Ceti	W E	3.5 3	1 22 20.0 1 27 18.0	2 48.6 2 9.4	49.10 49.35	49.85 50.35	..... .....	298 58 28.05 61 0 36.28	+ 0.57 + 0.95	+12.77 - 7.52	-1 48.45 +1 48.44	-22 7 25.91
13	τ Andromedæ	E W	2 ...	1 35 ..... .....	..... .....	49.80 49.70	50.65 50.45	25.334 25.334	358 48 39.58 1 9 47.92	+ 2.07 + 1.94	+ 0.28 - 0.28	- 1.24 + 1.24	+40 5 51.75
14	χ Ceti	W E	3 ...	1 42 17.0 1 47 8.0	2 44.2 2 6.8	49.15 49.65	49.85 50.50	..... .....	309 55 45.50 50 3 18.82	+ 0.62 + 1.20	+14.64 - 8.73	-1 12.01 +1 12.06	-11 9 30.61
15	53 Cassiopeiæ	E W	3 ...	1 53 15.0 1 58 27.0	2 50.8 2 21.2	49.75 49.65	50.60 50.70	..... .....	334 59 5.50 25 59 59.75	+ 1.30 + 1.31	+12.86 - 8.79	- 28.22 + 28.25	+63 56 1.23
16	December 17, L. 31 Cephei s. p.	W E	4 ...	10 31 4.0 10 35 46.0	2 27.7 2 14.3	49.60 49.55	50.05 49.90	..... .....	67 52 26.22 292 6 41.18	+ 1.26 + 1.16	+ 2.90 - 2.39	+2 27.90 -2 27.92	+73 9 20.19
17	6 H ¹ . Draconis	E W	3.5 ...	10 49 48.0 10 54 42.0	2 38.5 2 15.5	49.70 50.15	49.95 50.35	..... .....	320 39 11.88 39 18 28.52	+ 1.28 + 1.70	+ 3.42 - 2.50	- 49.58 + 49.59	+78 16 25.54
18	249 B. Ursæ Majoris	W E	3.5 ...	11 15 14.0 11 19 48.0	2 3.7 2 30.3	49.50 48.95	49.75 49.05	..... .....	25 54 39.60 334 4 27.85	+ 1.06 + 0.42	- 6.31 + 9.32	+ 29.42 - 29.42	+64 50 44.49
19	39 H. Cephei s. p.	E W	3.5 ...	11 25 46.0 11 30 20.0	2 16.2 2 17.8	48.75 49.90	49.05 50.10	..... .....	305 43 35.88 54 15 32.62	+ 0.34 + 1.45	- 0.54 + 0.55	-1 24.04 +1 24.02	+86 47 19.81
20	3 Draconis	W E	3.5 ...	11 34 44.0 11 39 36.0	2 31.3 2 20.7	49.75 49.05	49.90 40.20	..... .....	28 19 50.08 331 39 10.10	+ 1.28 + 0.56	- 7.91 + 6.84	+ 32.64 - 32.62	+67 15 57.79

Time.	Ther- m.	Atm. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904 o.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
16 21 7	32.7	...	...	14. Instrument in meridian, observation at I with movable thread.	1	369 59 35.19	-22.40
21 15	32.3	...	...	15. Instrument in meridian, W. observation assumed to be with movable thread at 27,000 rev.	2	31 88	...
21 18	32.3	...	...		3	34 56	...
21 41	31.4	33.2	29.894		4	35 14	...
21 51	31.7	...	...		5	35 56	...
0 5	32.1	...	...		6	36 61	+ 17.14
0 11	32.0	...	...		7	35 26	36.48
0 12	31.6	...	...		8	34 80	...
0 41	31.1	32.7	29.906		9	36 16	...
0 56	31.1	...	...		10	34 92	...
1 9	30.8	...	...		11	35 93	...
1 26	31.4	...	...		12	35 54	6.27
1 45	30.4	...	...		13	35 10	-23.99
1 56	29.3	31.3	29.906	Notes	14	36 08	...
2 05	24.1	25.4	29.964	Very faint and diffuse.	15	35 98	-25.97
2 11	24.0	...	...	One microscope reading decreased 10".	16	35 16	-38.16
2 14	21.9	...	...		17	35 85	...
2 28	21.7	...	...		18	35 97	...
2 41	24.7	25.3	29.888		19	35 14	...
					20	34 98	...

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	14 H ¹ . Draconis	E W	3.5 ...	11 57 56.0 12 3 8.0	2 32.3 2 39.7	49.50 50.20	49.80 50.45	..... .....	321 29 39.68 38 29 28.40	+ 1.10 + 1.79	+ 3.44 - 3.78	- 48.08 + 48.10	+77 25 55.87
2	5 B. Ursæ Minoris	W E	4 ...	12 12 34.0 12 17 4.0	1 22.2 3 7.8	49.90 49.30	50.10 49.35	..... .....	48 0 43.55 311 58 25.50	+ 1.44 + 0.76	- 0.20 + 1.07	+ 7.11 - 7.11	+86 57 32.53
3	December 19, L. Andromedæ	W E	2.5 ...	1 35 ..... .....	..... .....	49.25 48.70	50.05 49.85	27.458 27.458	1 8 23.68 358 47 15.42	+ 0.07 - 0.31	- 0.28 + 0.28	+ 1.22 - 1.22	+40 5 51.94
4	λ Ceti	E W	3 ...	1 42 26.0 1 47 21.0	2 35.6 2 19.4	49.20 49.45	50.10 50.25	..... .....	50 3 25.68 309 55 46.58	+ 0.82 + 1.03	- 13.14 + 10.55	+ 11.02 - 11.06	-11 9 31.96
5	53 Cassiopeiæ	W E	2.5 ...	1 53 19.0 1 58 23.0	2 47.2 2 16.6	49.15 49.25	49.90 50.00	..... .....	25 0 4.80 334 59 10.10	+ 0.70 + 0.79	- 12.33 + 8.23	+ 27.78 - 27.79	+63 56 1.49
6	μ Fornacis	E W	3.5 ...	2 6 8.0 2 11 10.0	2 41.9 2 20.1	49.70 49.55	50.25 50.00	..... .....	70 2 43.18 289 56 27.22	+ 1.14 + 0.94	- 10.12 + 7.58	+ 42.94 - 42.97	-31 10 25.50
7	ε Arietis	W E	3 ...	2 17 7.0 2 22 5.0	2 43.2 2 14.8	49.05 49.65	49.70 50.20	..... .....	331 15 15.08 28 43 48.58	+ 0.54 + 1.11	+ 23.14 - 15.78	- 32.69 + 32.70	+10 10 46.41
8	128 H ¹ . Ceti	E W	2.5 ...	2 28 15.5 2 33 9.5	2 43.6 2 10.4	50.00 49.85	50.95 50.50	..... .....	32 28 38.42 327 30 37.95	+ 1.64 + 1.34	- 21.01 + 13.35	+ 37.98 - 38.00	+ 6 25 55.48
9	μ Ceti	W E	3 ...	2 37 10.5 2 42 6.5	2 44.7 2 11.3	49.40 49.95	50.05 50.70	..... .....	330 47 10.90 29 11 49.48	+ 0.89 + 1.52	+ 23.25 - 14.78	- 33.38 + 33.39	+ 9 42 42.70
10	ε Arietis (mean)	E W	3 ...	2 51 18.3 2 56 10.3	2 35.5 2 16.5	50.25 50.00	50.80 50.55	..... .....	17 57 25.32 342 1 49.88	+ 1.71 + 1.46	- 31.07 + 23.94	+ 19.38 - 19.38	+20 57 36.96
11	δ Arietis	W E	3 ...	3 4 20.5 3 8 30.0	1 58.3 2 11.2	49.20 49.70	49.90 50.60	..... .....	340 26 23.30 19 32 51.58	+ 0.71 + 1.32	+ 16.74 - 20.59	- 21.24 + 21.24	+19 21 59.66
12	τ ¹ Arietis	E W	3 ...	3 13 20.7 3 18 4.0	2 30.9 2 12.4	49.90 49.70	50.65 50.40	..... .....	18 6 45.30 341 52 29.48	+ 1.44 + 1.22	- 29.05 + 22.36	+ 19.58 - 19.58	+20 48 14.78
13	ε Eridani	W E	3 ...	3 26 7.0 3 30 27.0	2 27.3 1 52.7	49.05 49.65	49.80 50.55	..... .....	311 18 17.15 48 40 45.60	+ 0.57 + 1.26	+ 12.08 - 7.07	- 1 8.00 + 1 8.01	- 9 46 56.32
14	δ Fornacis	W E	4 ...	3 36 16.0 3 40 52.0	2 19.3 2 16.7	49.25 49.75	50.35 50.65	..... .....	288 52 18.68 71 6 49.10	+ 0.98 + 1.36	+ 7.36 - 7.09	- 2 53.57 + 2 53.62	-32 14 45.09
15	ε Persei	E W	3 ...	3 52 ..... .....	..... .....	50.05 49.80	50.90 50.60	27.024 27.024	359 9 16.85 0 46 54.95	+ 2.39 + 2.10	+ 0.28 - 0.28	- 0.85 + 0.85	+39 44 6.16
16	λ Persei	W E	3 ...	3 57 13.5 4 1 23.5	2 24.7 1 45.3	49.75 49.60	50.55 50.45	..... .....	11 10 9.62 348 49 10.98	+ 1.33 + 1.19	- 29.42 + 15.58	+ 11.84 - 11.84	+50 5 35.41
17	December 20, L. Pegasi	E W	2.5 ...	22 35 21.0 22 40 14.5	1 28.2 3 25.3	50.45 50.05	51.15 51.00	..... .....	28 34 12.65 331 24 25.05	+ 1.44 + 1.16	- 6.79 + 36.77	+ 32.23 - 32.24	+10 20 12.28
18	c ¹ Aquarii	W E	4 ...	22 59 4.0 23 3 58.0	2 36.2 2 17.8	49.05 49.60	50.00 50.25	..... .....	206 50 33.55 63 8 33.58	+ 0.14 + 0.55	+ 10.58 - 8.23	- 1 56.44 + 1 56.45	-24 15 30.58
19	γ Sculptoris	E W	4 ...	23 11 6.0 23 16 2.0	2 41.1 2 14.9	49.95 49.60	50.85 50.85	..... .....	71 55 10.85 288 4 1.55	+ 1.05 + 0.87	- 9.71 + 6.81	+ 2 59.66 - 2 59.66	-33 3 9.46
20	70 Pegasi	W E	3.5 ...	23 21 36.0 23 26 31.0	2 51.0 2 4.0	49.20 50.00	50.05 50.85	..... .....	333 18 35.28 26 40 20.58	+ 0.24 + 1.06	+ 27.00 - 14.20	- 29.75 + 29.74	+12 14 14.48

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
17 12 1	24.8	.....	.....	3. Instrument in meridian, observation at IX with movable thread.				1	359 59 35.32	+ 36.91
12 21	25.4	.....	.....	15. Instrument in meridian, observation at I with movable thread.				2	36.06	+ 10.77
12 30	25.7	26.4	29.630					3	35.52	24.67
19 1 33	34.3	35.1	29.711					4	35.74	.....
1 50	33.7	.....	.....					5	36.14	-26.37
1 56	33.6	.....	.....					6	34.96	.....
2 9	33.3	.....	.....					7	36.34	-11.90
2 20	33.3	.....	.....					8	35.84	.....
2 31	32.7	.....	.....					9	35.64	.....
2 40	32.6	33.6	29.721					10	35.02	.....
2 54	32.4	.....	.....					11	36.53	.....
3 16	32.0	.....	.....					12	35.38	.....
3 29	31.8	.....	.....					13	34.80	.....
3 39	31.3	.....	.....					14	35.22	+ 3.49
4 0	31.1	31.8	29.733					15	36.52	.....
20 22 38	33.6	34.6	29.522					16	34.64	- 8.07
23 2	33.6	.....	.....					17	35.14	.....
23 14	33.2	.....	.....					18	35.00	-11.12
23 24	33.4	.....	.....					19	35.71	.....
								20	34.98	.....

Note.
2. Very faint; poor observation.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β^1 Aquarii	E	3.5	23 36 7.0	3 15.3	50.20	50.90	.....	57 41 56.15	+ 1.21	-18.12	+1 33.46	-18 48 22.06
		W	...	23 40 56.0	1 33.7	50.00	50.90	.....	302 17 23.42	+ 1.09	+ 4.17	-1 33.46	
2	274 G. Aquarii	W	4	23 46 16.0	2 15.9	49.75	50.90	.....	296 20 30.90	+ 0.95	+ 7.94	-1 59.06	-24 45 37.38
		E	...	23 50 54.0	2 22.1	50.30	51.05	.....	63 38 37.15	+ 1.32	- 8.68	+1 59.05	
3	14 H ¹ . Draconis S. P.	E	4	23 58 6.0	2 22.9	50.10	50.95	.....	296 22 48.25	+ 1.16	- 2.10	-1 58.91	+77 25 56.74
		W	...	0 2 42.0	2 13.1	50.30	51.10	.....	63 36 19.45	+ 1.33	+ 1.82	1 58.96	
4	5 B. Ursæ Minoris S. P.	W	4	0 11 36.0	2 21.6	50.00	51.00	.....	54 5 22.55	+ 1.14	+ 0.56	+1 21.75	+86 57 33.33
		E	...	0 16 20.0	2 28.4	49.70	50.45	.....	305 53 47.65	+ 0.73	- 0.61	-1 21.75	
5	77 G. Sculptoris	E	4	0 26 48.0	2 17.0	50.05	51.05	.....	68 57 32.22	+ 1.20	- 7.38	+2 33.02	-30 5 7.42
		W	...	0 31 24.0	2 19.0	50.05	51.15	.....	291 1 35.02	+ 1.25	+ 7.60	-2 33.00	
6	5 Andromedæ	E	3.5	0 39 38.0	2 46.7	49.95	51.00	.....	15 10 9.22	+ 1.13	-41.23	+ 16.09	+23 45 5.52
		W	...	0 44 29.5	2 4.8	49.90	50.80	.....	344 49 14.85	+ 0.99	+23.12	- 16.08	
7	26 Ceti	W	4	0 56 18.0	2 44.1	48.95	49.50	.....	321 56 10.15	- 0.15	+18.53	- 46.40	+ 0 51 23.62
		E	...	1 1 25.0	2 22.9	49.65	50.25	.....	38 2 55.32	+ 0.59	-14.06	+ 46.39	
8	ζ^1 Piscium	E	3.5	1 6 21.0	2 31.6	49.95	50.55	.....	31 50 12.30	+ 0.88	-18.34	+ 36.80	+ 7 4 19.88
		W	...	1 11 13.0	2 20.4	49.60	50.20	.....	328 8 58.58	+ 0.53	+15.74	- 36.80	
9	ν Andromedæ	W	3.5	1 22 ....	.....	48.95	49.80	27.931	5 57 13.78	- 0.74	- 0.34	+ 6.23	+44 55 6.72
		E	...	.....	.....	49.70	50.15	27.931	353 57 44.90	- 0.15	+ 0.34	- 6.23	
10	ν Piscium	E	4	1 33 52.0	2 43.9	50.20	50.95	.....	33 54 11.20	+ 1.21	-20.36	+ 39.79	+ 5 0 20.28
		W	...	1 38 41.0	2 5.1	49.70	50.50	.....	326 5 6.22	+ 0.74	+11.86	- 39.77	
11	ζ Ceti	W	4	1 44 6.0	2 46.9	49.00	49.55	.....	310 16 46.98	- 0.12	+15.22	-1 9.73	-10 48 25.52
		E	...	1 49 5.0	2 12.1	50.05	50.65	.....	49 42 15.62	+ 0.98	- 9.53	+1 9.68	
12	α Piscium (mean)	E	4	1 54 44.0	2 30.6	50.20	50.85	.....	36 36 9.38	+ 1.16	-16.12	+ 43.92	+ 2 18 13.06
		W	...	1 59 24.0	2 9.4	49.55	50.05	.....	323 23 2.65	+ 0.44	+11.90	- 43.90	
13	Groombridge 4163 S. P.	E	3	11 48 4.0	2 16.2	49.60	50.35	.....	292 50 25.42	+ 0.66	- 2.37	-2 22.36	+73 53 11.17
		W	...	11 52 42.0	2 21.8	50.10	50.80	.....	67 8 39.60	+ 1.16	+ 2.57	+2 22.32	
14	14 H ¹ . Draconis	W	2.5	11 57 52.0	2 37.1	49.75	50.35	.....	38 29 28.72	+ 0.75	- 3.66	+ 47.95	+77 25 56.39
		E	...	12 2 52.0	2 22.9	49.40	50.00	.....	321 29 38.85	+ 0.41	+ 3.03	- 47.95	
15	318 B. Cephei S. P.	W	3	12 8 8.0	2 50.9	49.80	50.40	.....	64 36 27.50	+ 0.80	+ 3.21	+2 6.49	+76 25 39.72
		E	...	12 14 14.0	3 15.1	49.45	50.00	.....	295 22 41.08	+ 0.42	- 4.19	-2 6.51	
16	κ Draconis	E	3	12 27 4.0	2 25.9	49.85	50.50	.....	328 36 53.18	+ 0.88	+ 5.84	- 36.79	+70 18 28.02
		W	...	12 31 56.0	2 26.1	50.10	50.65	.....	31 22 13.80	+ 1.07	- 5.86	+ 36.79	
17	21 Cassiopeiæ S. P.	W	3	12 37 26.0	2 5.0	49.95	50.55	.....	66 33 33.82	+ 0.97	+ 1.94	+2 18.40	+74 28 22.50
		E	...	12 42 20.0	2 49.0	49.55	50.25	.....	293 25 34.80	+ 0.61	- 3.53	-2 18.39	
18	43 H. Cephei S. P.	E	3.5	12 53 6.0	2 51.2	49.50	50.25	.....	304 41 25.32	+ 0.57	- 1.12	-1 26.96	+85 45 7.48
		W	...	12 57 40.0	1 42.8	50.05	50.70	.....	55 17 41.00	+ 1.10	+ 0.40	+1 26.98	
19	December 21, L. 5 Pegasi	W	2.5	22 33 58.5	2 50.8	49.00	49.90	.....	331 24 37.38	0.00	+25.45	- 32.86	+10 20 12.34
		E	...	22 38 52.5	2 3.2	49.30	50.15	.....	28 34 18.72	+ 0.29	-13.25	+ 32.80	
20	δ Aquarii	E	3	22 59 4.0	2 36.2	50.95	52.00	.....	63 8 29.85	+ 2.07	-10.58	+1 50.32	-24 15 29.36
		W	...	23 3 50.0	2 15.8	50.45	51.25	.....	296 50 38.55	+ 1.45	+ 8.00	-1 50.42	

Time	Ther. 3532.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1904.0.
<i>h m s</i>	<i>"</i>	<i>"</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
22 21 13	11.1	...	29.998	9 Instrument in meridian, observation at IX with movable thread.	1	359 59 11.06	...
22 21 14	11.1	34.1	29.998		2	34 58	- 9.14
22 21 15	11.1	...	29.998		3	34 58	+ 12.21
22 21 16	11.1	...	29.998		4	36.01	+ 12.04
22 21 17	11.1	...	29.998		5	34.06	- 5.97
22 21 18	11.1	34.4	29.998		6	34.04	...
22 21 19	11.1	...	29.998		7	34.05	-14.28
22 21 20	11.1	...	29.998		8	34.04	...
22 21 21	11.1	...	29.998		9	34.05	-26.44
22 21 22	11.1	...	29.998		10	35.44	...
22 21 23	11.1	...	29.998		11	34.55	...
22 21 24	11.1	14.7	29.998		12	34.72	-11.41
22 21 25	11.1	16.2	29.998		13	34.50	...
22 21 26	11.1	...	29.998	Notes	14	34.05	+ 12.28
22 21 27	11.1	...	29.998	6.11 Diffuse	15	34.40	-36.76
22 21 28	11.1	...	29.998	16 W. One level reading decreased 2 div	16	34.16	...
22 21 29	11.1	...	29.998		17	34.11	...
22 21 30	11.1	...	29.998		18	34.64	...
22 21 31	11.1	...	29.998		19	34.11	...
22 21 32	11.1	...	29.998		20	34.62	-11.10

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Sculptoris	W E	4 ...	23 11 14.0 23 16 4.0	2 33.2 2 16.8	49.95 50.45	51.15 51.60	..... .....	288 4 3.80 71 55 1.35	+ 1.15 + 1.62	+ 8.78 - 7.00	-3 4.30 +3 4.35	-33 3 8.76
2	15 Andromedæ	W E	3 ...	23 30 ..... .....	..... .....	50.35 50.40	51.35 51.45	27.736 27.736	0 45 17.82 359 9 56.32	+ 0.71 + 0.80	- 0.28 + 0.28	+ 0.84 - 0.84	+39 42 57.94
3	ϕ Pegasi	E W	3 ...	23 45 12.0 23 50 1.5	2 33.5 2 16.0	51.30 50.70	51.95 51.55	..... .....	20 19 14.10 339 39 56.28	+ 2.24 + 1.74	-27.27 +21.41	+ 22.54 - 22.55	+18 35 39.32
4	14 H ¹ . Draconis s. p.	W E	3 ...	23 57 40.0 0 2 50.0	2 49.1 2 20.9	50.55 50.45	51.25 50.90	..... .....	63 36 13.45 296 22 51.52	+ 1.49 + 1.27	+ 2.94 - 2.05	+2 2.17 -2 2.22	+77 25 57.56
5	ρ Andromedæ	E W	3 ...	0 16 ..... .....	..... .....	50.30 50.70	50.90 51.90	25.928 25.928	1 27 21.72 358 30 16.05	+ 1.92 + 2.62	+ 0.26 - 0.26	+ 1.57 - 1.57	+37 26 42.36
6	77 G. Sculptoris	W E	4 ...	0 26 11.0 0 31 8.0	2 54.1 2 2.9	50.10 50.70	50.95 51.65	..... .....	291 1 35.58 68 57 25.10	+ 1.11 + 1.78	+11.92 - 5.94	-2 37.45 +2 37.49	-30 5 6.96
7	21 Cassiopeiæ	E W	3 ...	0 36 38.0 0 41 38.0	2 52.9 2 7.1	50.95 50.50	51.90 51.15	..... .....	324 27 5.35 35 31 59.02	+ 2.03 + 1.43	+ 5.84 - 3.16	- 43.58 + 43.61	+74 28 22.31
8	α Sculptoris	W E	4 ...	0 51 32.0 0 56 40.0	2 35.9 2 32.1	49.85 50.30	50.60 50.90	..... .....	291 14 15.55 68 44 51.98	+ 0.81 + 1.19	+ 9.59 - 9.13	-2 35.93 +2 35.94	-29 52 28.30
9	χ Piscium	E W	3.5 ...	1 3 37.0 1 8 32.5	2 50.4 2 5.1	50.40 50.20	51.40 51.35	..... .....	18 23 16.95 341 36 6.98	+ 1.49 + 1.38	-36.57 +19.72	+ 20.32 - 20.32	+20 31 49.46
10	ω Andromedæ	E W	...	1 22 ..... .....	..... .....	50.75 50.65	51.60 51.35	25.714 25.714	353 59 14.35 5 58 41.80	+ 2.50 + 2.33	+ 0.34 - 0.34	- 6.43 + 6.42	+44 55 6.40
11	ν Piscium	W E	3 ...	1 33 43.5 1 38 34.5	2 52.5 1 58.5	49.90 50.55	50.50 51.45	..... .....	326 4 57.65 33 53 58.68	+ 0.78 + 1.61	+22.55 -10.64	- 41.07 + 41.06	+ 5 0 21.28
12	ζ Ceti	E W	3 ...	1 44 6.0 1 49 8.5	2 47.0 2 15.5	50.50 50.20	51.45 51.35	..... .....	49 42 17.32 310 16 54.05	+ 1.56 + 1.37	-15.24 +10.03	+1 12.04 -1 12.06	-10 48 24.46
13	α Piscium (mean)	W E	3 ...	1 54 22.0 1 59 24.0	2 52.7 2 9.3	50.00 50.65	50.95 51.60	..... .....	323 22 56.32 30 36 3.68	+ 1.06 + 1.73	+21.20 -11.88	- 45.45 + 45.46	+ 2 18 13.75

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1904.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
21 23 14	30.3	...	...	2. Instrument in meridian, observation at IX with movable thread.			1	359 59 34.88	.....
23 48	29.9	31.6	30.100	5, 10. Instrument in meridian, observation at I with movable thread.			2	35.26	-31.47
0 1	29.6	...	...				3	34.24	.....
0 14	29.0	...	...				4	34.28	+37.33
0 29	28.9	...	...				5	34.78	-29.10
0 40	28.4	...	...				6	34.80	- 5.91
0 55	28.6	30.1	30.114	Note.			7	35.27	.....
1 6	28.2	...	...	5. Poor observation.			8	35.00	.....
1 19	27.7	...	...				9	34.98	-26.84
1 36	28.2	...	...				10	35.36	-26.49
1 47	27.9	...	...				11	35.31	.....
1 57	27.6	29.4	30.134				12	34.54	.....
							13	36.06	-11.26

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
	January 1, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	4 H. Draconis s. p.	W	3.5	0 4 46.0	3 5.6	48.25	54.40	.....	62 54 15.20	+ 1.54	+ 3.37	+1 50.28	+78 8 22.66
		E	...	0 8 56.0	1 4.4	48.75	54.70	.....	297 5 17.78	+ 1.93	- 0.41	-1 50.30	
2	5 B. Ursæ Minoris s. p.	E	2.5	0 13 26.0	0 39.1	48.85	55.00	.....	305 53 56.55	+ 2.15	- 0.04	-1 18.13	+86 57 33.06
		W	...	0 17 48.0	3 42.9	48.55	54.65	.....	54 5 39.82	+ 1.81	+ 1.38	+1 18.11	
3	κ Draconis s. p.	W	3	0 26 54.0	2 38.7	48.30	54.15	.....	70 43 21.00	+ 1.42	+ 3.81	+2 40.60	+70 18 26.30
		E	...	0 31 42.0	2 9.3	48.70	54.50	.....	289 16 14.08	+ 1.83	- 2.53	-2 40.66	
4	21 Cassiopeiæ	W	3	0 36 43.0	2 49.0	48.10	54.30	.....	35 32 19.80	+ 1.41	- 5.58	+ 40.52	+74 28 23.28
		E	...	0 41 22.0	1 50.0	48.70	54.50	.....	324 27 19.25	+ 1.81	+ 2.36	- 40.55	
5	8 Draconis s. p.	E	4	0 49 16.0	2 32.6	48.40	54.50	.....	284 55 38.92	+ 1.66	- 4.17	-3 29.83	+65 56 58.80
		W	...	0 54 8.0	2 19.4	48.50	54.30	.....	75 4 0.65	+ 1.62	+ 3.48	+3 29.95	
6	Groombridge 2006 s. p.	W	2.5	1 3 4.0	0 30.0	48.00	54.00	.....	52 53 52.15	+ 1.20	+ 0.02	+1 15.18	+88 9 20.86
		E	...	1 7 56.0	4 22.0	48.60	54.55	.....	307 5 38.15	+ 1.79	- 1.17	-1 15.23	
7	1 Ursæ Minoris s. p.	E	3	1 16 8.0	2 17.4	48.80	54.55	.....	304 11 19.02	+ 1.88	- 0.80	-1 23.70	+85 14 50.20
		W	...	1 20 50.0	2 24.6	48.50	54.40	.....	55 48 16.45	+ 1.67	+ 0.89	+1 23.71	
8	40 Cassiopeiæ	W	3.5	1 28 0.0	3 5.5	48.00	53.75	.....	33 37 36.55	+ 1.06	- 7.90	+ 37.91	+72 33 34.48
		E	...	1 33 2.0	1 56.5	48.85	54.30	.....	326 22 4.92	+ 1.81	+ 3.12	- 37.91	
9	5 Draconis s. p.	W	4	1 46 42.0	2 3.6	48.25	53.90	.....	75 49 26.70	+ 1.27	+ 2.81	+3 42.14	+65 11 19.79
		E	...	1 50 58.0	2 12.4	48.55	54.15	.....	284 10 9.60	+ 1.57	- 3.22	-3 42.17	
10	ν Fornacis	E	3	1 57 32.0	2 50.4	48.80	54.90	.....	68 38 15.68	+ 2.08	-11.48	+2 24.85	-29 45 24.81
		W	4	2 2 18.0	1 55.6	48.05	53.50	.....	291 21 26.82	+ 0.97	+ 5.28	-2 24.84	
11	μ Fornacis	W	3.5	2 6 18.0	2 33.8	47.45	53.10	.....	289 56 31.35	+ 0.48	+ 9.13	-2 35.96	-31 10 27.56
		E	3	2 11 10.0	2 18.2	48.80	54.55	.....	70 3 2.92	+ 1.87	- 7.37	+2 35.99	
12	ξ Arietis	E	2.5	2 17 12.5	2 39.7	49.45	55.05	.....	28 44 9.28	+ 2.49	-22.15	+ 31.31	+10 10 45.98
		W	...	2 22 6.0	2 13.8	48.30	53.60	.....	331 15 34.25	+ 1.15	+15.55	- 31.33	
13	128 H ¹ . Ceti	W	3	2 28 11.0	2 50.1	47.50	52.95	.....	327 30 42.38	+ 0.38	+22.71	- 36.39	+ 6 25 55.30
		E	...	2 33 11.5	2 10.4	49.05	54.75	.....	32 28 46.60	+ 2.09	-13.35	+ 36.41	
14	μ Ceti	E	3	2 37 8.0	2 49.3	49.20	54.90	.....	29 12 14.78	+ 2.29	-24.56	+ 31.98	+ 9 42 42.26
		W	...	2 42 11.0	2 13.7	48.10	53.45	.....	330 47 31.42	+ 0.96	+15.32	- 31.98	
15	ε Arietis (mean)	W	3.5	2 51 14.5	2 41.3	47.00	52.55	.....	342 1 55.65	- 0.05	+33.43	- 18.55	+20 57 37.20
		E	...	2 56 0.0	2 10.2	48.95	54.95	.....	17 57 30.45	+ 2.16	-21.79	+ 18.54	
16	δ Arietis	E	3.5	3 3 24.0	2 56.9	49.20	54.95	.....	19 33 20.62	+ 2.29	-37.42	+ 20.33	+19 22 0.34
		W	...	3 8 40.0	2 19.1	47.90	53.20	.....	340 26 29.65	+ 0.77	+23.14	- 20.33	
17	January 2, L. B. Ursæ Minoris s. p.	E	2.5	0 14 10.0	0 8.4	47.80	52.80	.....	307 8 38.72	+ 0.33	0.00	-1 15.11	+88 13 18.10
		W	...	0 18 24.0	4 5.6	49.10	53.70	.....	52 49 56.85	+ 1.47	+ 1.00	+1 15.13	
18	2 Cassiopeiæ	W	3	0 41 24.5	2 11.2	50.75	51.45	.....	11 31 53.58	+ 1.74	-23.26	+ 11.68	+ 50 27 11.60
		E	...	0 45 29.5	1 53.8	49.25	50.55	.....	348 27 47.50	+ 0.50	+17.50	- 11.68	
19	α Sculptoris	E	4	0 51 26.0	2 43.7	50.30	51.30	.....	68 45 19.95	+ 1.43	-10.58	+2 26.24	-29 52 30.25
		W	...	0 56 34.0	2 24.3	51.05	51.55	.....	291 14 19.38	+ 1.95	+ 8.22	-2 26.29	
20	γ Piscium	W	3	1 3 34.0	2 55.3	50.05	51.15	.....	341 36 1.68	+ 1.23	+38.70	- 19.05	+20 31 48.40
		E	...	1 8 35.5	2 6.2	50.00	51.00	.....	18 23 18.92	+ 1.12	-20.06	+ 19.05	

Time.	Ther- m.	At- ther	Barom.	Observation made at V with fixed thread, except as noted below							No.	Zenith point.	Red. to 1905.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
1 5 7	52.4	60.1	29.696								1	359 50 49.70	
1 5 12	52.1	59.8	29.696								2	50.82	+17.84
1 5 17	51.7	59.5	29.696								3	49.78	
1 5 22	51.4	59.2	29.696								4	49.51	
1 5 27	51.1	58.9	29.696								5	51.14	
1 5 32	50.8	58.6	29.696								6	46.04	+15.92
1 5 37	50.5	58.3	29.696								7	49.56	+15.22
1 5 42	50.2	58.0	29.696								8	49.78	
1 5 47	49.9	57.7	29.696								9	49.15	+12.16
1 5 52	49.6	57.4	29.696								10	49.68	+17.24
1 5 57	49.3	57.1	29.696								11	49.20	
1 6 02	49.0	56.8	29.696								12	50.28	+ 5.22
1 6 07	48.7	56.5	29.696								13	50.42	
1 6 12	48.4	56.2	29.696								14	50.10	
1 6 17	48.1	55.9	29.696								15	49.92	
1 6 22	47.8	55.6	29.696								16	49.52	
1 6 27	47.5	55.3	29.696								17	49.20	
1 6 32	47.2	55.0	29.696								18	48.78	-11.08
1 6 37	46.9	54.7	29.696								19	50.15	
1 6 42	46.6	54.4	29.696								20	50.00	- 1.09

Notes
6. Mean of two microscopes used.
18. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	109 G. Sculptoris	E W	3.5 ...	1 16 38.0 1 21 26.0	2 35.9 2 12.1	50.85 51.50	51.20 51.95	..... .....	70 19 17.12 289 40 19.20	+ 1.67 + 2.38	- 9.34 + 6.71	+2 38.96 -2 39.02	-31 26 42.93
2	ν Andromedæ	W E	3 ...	1 31 ..... .....	..... .....	51.00 50.05	51.40 51.00	27.253 27.253	1 58 49.45 357 57 32.78	+ 1.10 + 0.42	- 0.29 + 0.29	+ 2.01 - 2.02	+40 55 57.04
3	φ Persei	E W	2.5 ...	1 35 59.0 1 40 23.5	1 52.5 2 32.0	50.65 51.35	51.25 51.95	..... .....	348 42 12.82 11 17 37.42	+ 1.59 + 2.30	+17.56 -32.04	- 11.46 + 11.47	+50 12 45.96
4	ξ Piscium	W E	2.5 ...	1 46 31.0 1 51 5.0	2 15.9 2 18.1	50.90 49.85	51.45 50.90	..... .....	323 48 2.75 36 11 36.55	+ 1.82 + 0.99	+13.26 -13.69	- 41.96 + 41.94	+ 2 43 1.68
5	γ Trianguli	E W	3 ...	2 12 ..... .....	..... .....	50.10 50.95	51.10 51.60	26.188 26.188	5 29 32.22 354 28 12.92	+ 1.95 + 2.66	+ 0.22 - 0.22	+ 5.53 - 5.53	+33 24 31.60
6	ρ Ceti	W E	3 ...	2 19 46.0 2 23 42.0	1 44.4 2 11.6	50.00 49.30	50.85 50.45	..... .....	308 22 18.88 51 37 21.28	+ 1.05 + 0.48	+ 5.75 - 9.14	-1 12.31 +1 12.34	-12 43 19.16
7	ν Ceti	E W	3 ...	2 28 21.0 2 33 5.0	2 41.2 2 2.8	49.75 50.75	51.05 51.55	..... .....	33 44 10.78 326 15 35.65	+ 1.02 + 1.78	-19.76 +11.47	+ 38.31 - 38.32	+ 5 10 36.76
8	39 Arietis	W E	3 ...	2 39 43.7 2 44 12.7	2 40.6 1 48.4	49.75 49.70	50.80 50.95	..... .....	349 54 58.08 10 4 11.42	+ 0.88 + 0.95	+54.79 -24.98	- 10.21 + 10.21	+28 51 9.61
9	η Eridani	W E	3 ...	2 49 9.0 2 54 5.0	2 47.2 2 8.8	50.50 49.75	51.50 50.70	..... .....	311 48 35.02 48 10 55.68	+ 1.65 + 0.83	+15.70 - 9.32	-1 4.15 +1 4.14	- 9 16 44.92
10	94 Ceti	E W	3 ...	3 5 24.0 3 10 5.0	2 40.6 2 0.4	50.85 51.45	51.65 51.95	..... .....	40 27 46.50 319 31 56.72	+ 1.89 + 2.36	-16.85 + 9.48	+ 49.00 - 48.99	- 1 33 13.84
11	13 Ceti	W E	2.5 ...	0 27 46.0 0 32 30.5	2 43.9 2 0.6	51.55 51.45	50.60 50.55	..... .....	316 58 8.52 43 1 19.08	+ 0.26 + 0.17	+16.66 - 9.02	- 57.58 + 57.60	- 4 7 3.35
12	ν Cassiopeia	E W	2.5 ...	0 41 7.5 0 45 27.5	2 28.5 1 51.5	51.90 52.60	51.00 51.10	..... .....	348 27 33.98 11 31 44.85	+ 0.64 + 1.05	+29.80 -16.80	- 12.61 + 12.61	+50 27 11.58
13	72 Piscium	W E	2.5 ...	0 57 21.0 1 2 27.0	2 52.2 2 13.8	51.95 51.70	50.65 50.30	..... .....	335 30 36.35 24 28 47.28	+ 0.48 + 0.18	+29.40 -17.75	- 28.13 + 28.14	+14 26 6.75
14	37 Ceti	E W	2.5 ...	1 7 1.0 1 11 54.0	2 44.6 2 8.4	51.95 52.50	50.95 51.05	..... .....	47 20 19.52 312 39 18.55	+ 0.63 + 0.97	-15.46 + 9.41	+1 7.04 -1 7.02	- 8 26 8.28
15	109 G. Sculptoris	W E	3.5 ...	1 17 16.0 1 21 22.0	1 58.2 2 7.8	52.35 52.00	51.05 50.70	..... .....	289 40 34.42 70 18 59.18	+ 0.89 + 0.54	+ 5.37 - 6.28	-2 51.51 +2 51.53	-31 26 41.27
16	ν Andromedæ	E W	2.5 ...	1 31 ..... .....	..... .....	52.25 52.70	51.05 51.10	26.014 26.014	357 58 21.40 1 59 36.15	+ 1.57 + 1.99	+ 0.29 - 0.43	- 2.17 + 2.17	+40 55 56.03
17	φ Persei	W E	2.5 ...	1 35 31.0 1 40 2.5	2 20.7 2 10.8	52.50 51.85	51.05 50.60	..... .....	11 17 29.10 348 42 5.78	+ 0.97 + 0.41	-27.45 +23.72	+ 12.35 - 12.36	+50 12 45.34
18	ξ Piscium	E W	3 ...	1 46 7.5 1 51 5.0	2 39.7 2 17.8	52.55 52.55	51.30 51.05	..... .....	36 11 34.50 323 48 2.48	+ 1.13 + 1.00	-18.30 +13.63	+ 45.31 - 45.33	+ 2 43 1.20
19	ν Fornacis	W E	3 ...	1 57 38.0 2 2 38.0	2 44.7 2 15.3	52.05 52.40	50.65 51.05	..... .....	291 21 30.62 68 37 55.98	+ 0.54 + 0.92	+10.73 - 7.24	-2 37.40 +2 37.40	-29 45 24.65
20	γ Trianguli	W E	2.5 ...	2 12 ..... .....	..... .....	52.50 52.20	51.00 50.80	27.495 27.495	354 27 21.71 5 28 37.25	+ 0.22 - 0.18	- 0.22 + 0.33	- 5.98 + 5.98	+33 24 32.81

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
2 1 20	46.6	.....	.....	2. Instrument in meridian, observation at IX with movable thread.				1	359 59 48.84	+16.87
1 39	46.3	.....	.....	5. Instrument in meridian, observation at I with movable thread.				2	49.18	.....
1 50	46.6	.....	.....	16. Instrument in meridian; E. observation at I; W. observation at I+5" with movable thread.				3	49.83	.....
2 10	46.6	48.4	29.394	20. Instrument in meridian; W. observation at IX; E. observation at IX+5" with movable thread.				4	50.83	.....
2 22	46.5	.....	.....					5	48.70	.....
2 31	46.1	.....	.....					6	49.16	+12.69
2 42	45.6	.....	.....					7	50.46	.....
2 52	45.5	.....	.....					8	50.46	.....
3 8	45.3	47.1	29.380					9	50.57	+ 0.44
4 0 31	19.9	20.7	29.898					10	49.78	.....
1 0	19.7	.....	.....					11	50.06	+10.28
1 10	19.4	.....	.....					12	47.84	.....
1 20	19.4	20.3	29.910					13	46.76	-11.06
1 38	19.4	.....	.....					14	47.08	+ 0.86
1 49	18.6	.....	.....					15	46.82	+ 9.32
2 0	18.6	.....	.....					16	47.07	+10.96
2 10	18.7	.....	.....					17	46.26	.....
								18	47.21	.....
								19	45.78	+17.51
								20	46.74	.....

Notes.

8 E. One microscope reading increased 30".

15. Paint.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Ceti	E	3	2 18 53.0	2 37.7	52.50	51.00	.....	51 37 15.10	+ 0.95	-13.13	+1 18.25	-12 43 18.10
		W	...	2 23 29.0	1 58.3	52.45	50.90	.....	308 22 21.68	+ 0.88	+ 7.39	-1 18.24	
2	ν Ceti	W	3	2 28 11.0	2 51.6	51.70	50.35	.....	326 15 27.15	+ 0.20	+22.40	- 41.42	+ 5 10 37.00
		E	...	2 33 10.0	2 7.4	52.45	51.10	.....	33 43 57.42	+ 0.98	-12.35	+ 41.42	
3	39 Arietis	E	2.5	2 39 38.7	2 46.0	52.60	51.30	.....	10 4 39.95	+ 1.15	-58.53	+ 11.04	+28 51 10.15
		W	...	2 44 48.5	2 23.8	52.50	51.05	.....	349 55 6.80	+ 0.97	+43.93	- 11.04	
4	λ Ceti	W	3	2 52 9.0	2 37.8	51.70	50.35	.....	329 36 24.65	+ 0.20	+20.65	- 36.42	+ 8 31 37.80
	January 8, L.	E	...	2 56 56.0	2 9.2	52.40	51.00	.....	30 23 3.25	+ 0.90	-13.85	+ 36.44	
5	4 H. Draconis	W	2	12 3 12.0	4 41.7	57.70	52.20	.....	39 12 8.98	+ 0.72	-10.94	+ 50.77	+78 8 20.40
		E	...	12 8 16.0	0 22.3	57.35	51.70	.....	320 47 32.38	+ 0.28	+ 0.07	- 50.77	
6	5 B. Ursæ Minoris	E	1.5	12 14 22.0	0 12.3	49.95	50.70	.....	311 58 39.95	+ 0.51	0.00	-1 9.12	+86 57 31.18
		W	...	12 19 34.0	5 24.3	50.15	51.00	.....	48 0 53.75	+ 0.77	- 3.18	+1 9.12	
7	κ Draconis	W	2	12 27 50.0	1 44.4	50.05	50.75	.....	31 22 20.18	+ 0.59	- 2.99	+ 37.98	+70 18 25.44
		E	...	12 32 6.0	2 31.6	49.95	50.80	.....	328 37 9.22	+ 0.56	+ 6.31	- 37.98	
8	α Cassiopeiæ s. p.	E	3	12 37 44.0	1 48.7	49.95	50.60	.....	293 25 51.15	+ 0.46	- 1.46	-2 23.03	+74 28 23.90
		W	...	12 42 6.0	2 33.3	50.05	50.85	.....	66 33 39.42	+ 0.64	+ 2.91	+2 23.12	
9	8 Draconis	W	2.5	12 49 31.0	2 19.3	50.15	51.00	.....	27 1 2.50	+ 0.77	- 7.38	+ 31.84	+65 56 57.44
		E	...	12 54 22.0	2 31.7	50.00	50.50	.....	332 58 28.75	+ 0.44	+ 8.76	- 31.86	
10	Groombridge 2006	E	2	13 2 42.0	0 58.5	50.00	50.45	.....	310 46 57.42	+ 0.41	+ 0.06	-1 12.43	+88 9 17.36
		W	...	13 7 30.0	3 49.5	50.00	50.75	.....	49 12 34.88	+ 0.56	- 0.95	+1 12.46	
11	ϕ Cassiopeiæ s. p.	W	3	13 16 34.0	2 49.7	49.90	50.45	.....	73 22 39.72	+ 0.36	+ 4.85	+3 27.30	+67 38 17.18
		E	3.5	13 21 12.0	1 48.3	49.90	50.70	.....	286 36 48.58	+ 0.49	- 1.98	-3 27.25	
12	α Cassiopeiæ s. p.	E	3.5	13 28 28.0	2 38.2	50.15	50.85	.....	291 31 18.65	+ 0.69	- 3.42	-2 37.36	+72 33 36.10
		W	...	13 33 24.0	2 17.8	50.10	50.65	.....	68 28 12.52	+ 0.56	+ 2.59	+2 37.33	
13	i Draconis	W	3	13 47 38.0	1 9.3	50.00	50.60	.....	26 15 19.15	+ 0.49	- 1.93	+ 30.85	+65 11 18.56
		E	...	13 51 30.0	2 42.7	50.05	50.60	.....	333 44 4.38	+ 0.52	+10.65	- 30.86	
14	α Draconis	E	2.5	13 59 16.0	2 40.8	49.95	50.25	.....	334 5 49.85	+ 0.28	+10.68	- 30.39	+64 49 33.32
	January 12, L.	W	...	14 4 7.0	2 10.2	50.00	50.60	.....	25 53 39.92	+ 0.49	- 7.00	+ 30.40	
15	4 H. Draconis	E	2.5	12 2 40.0	5 14.9	48.70	50.90	.....	320 47 16.88	+ 0.20	+13.67	- 48.66	+78 8 20.60
		W	...	12 7 58.0	0 3.1	48.60	50.65	.....	39 12 1.50	+ 0.02	0.00	+ 48.67	
16	6 B. Ursæ Minoris	W	3	12 12 14.0	2 14.1	48.45	50.50	.....	49 16 37.72	- 0.13	- 0.31	+1 9.31	+88 13 16.56
		E	...	12 17 40.0	3 11.9	48.65	50.85	.....	310 42 55.20	+ 0.16	+ 0.64	-1 9.31	
17	8 Draconis	E	2.5	12 50 12.0	1 39.2	49.50	51.50	.....	332 58 31.92	+ 0.92	+ 3.75	- 30.49	+65 56 57.29
		W	...	12 53 38.0	1 40.8	49.25	51.45	.....	27 1 0.55	+ 0.77	- 4.34	+ 30.49	
18	9 B. Ursæ Minoris	E	3	13 21 10.0	2 41.1	48.90	51.40	.....	326 2 48.32	+ 0.56	+ 5.80	- 40.25	+72 52 48.87
		W	...	13 26 0.0	2 8.9	48.95	51.40	.....	33 56 41.85	+ 0.58	- 3.72	+ 40.25	
19	13 B. Ursæ Minoris	W	2.5	13 32 9.0	2 53.5	48.55	50.85	.....	32 47 15.08	+ 0.11	- 7.40	+ 38.53	+71 43 16.17
		E	...	13 37 7.0	2 4.5	48.80	51.00	.....	327 12 21.60	+ 0.31	+ 3.81	- 38.52	
20	i Draconis	E	2	13 46 6.0	2 42.2	49.20	51.40	.....	333 44 3.28	+ 0.72	+10.59	- 29.51	+65 11 18.43
		W	...	13 51 7.0	2 18.8	49.10	51.45	.....	26 15 26.28	+ 0.69	- 7.75	+ 29.51	

Time.	Ther. 3802	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
4 2 23	16.2	19.7	29.914					1	159 59 46.44	+12.87
2 31	16.1							2	47.90	
2 41	16.0							3	47.14	+ 0.19
2 55	17.6	19.3	29.914					4	47.91	+ 7.05
3 12 6	21.7							5	45.74	
12 18	21.7	22.5	30.276					6	45.90	+17.96
12 11	21.8							7	46.94	
12 45	20.9							8	46.60	
12 51	20.4							9	46.91	
11 6	19.4	21.4	30.286					10	46.20	+16.57
11 20	19.7							11	46.04	-11.19
11 11	20.7							12	45.78	
11 64	19.5							13	46.62	+13.84
14 1	19.7	21.3	30.294					14	47.12	
12 12 6	16.1	16.1	29.876					15	46.14	
12 15	15.1							16	46.64	
12 16	14.7							17	46.78	
13 16		17.8	29.884					18	46.70	
13 21	14.7							19	46.76	+15.40
13 16	14.6							20	46.90	+14.15
13 49	14.8									

Note.
15.16. Faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Draconis	W	3	13 59 10.0	2 47.7	48.80	50.90	.....	25 53 46.30	+ 0.26	-11.62	+ 29.05	+64 49 33.60
		E	...	14 3 43.0	1 45.3	48.85	51.00	.....	334 5 54.15	+ 0.33	+ 4.58	- 29.05	
2	4 Ursæ Minoris	E	3.5	14 7 46.0	1 33.2	49.20	51.35	.....	320 56 25.28	+ 0.70	+ 1.22	- 48.54	+77 59 23.79
		W	...	14 12 36.0	3 16.8	49.20	51.40	.....	39 3 9.20	+ 0.72	- 5.43	+ 48.54	
3	5 Ursæ Minoris	W	3	14 25 16.0	2 33.9	48.50	50.75	.....	37 10 41.65	+ 0.03	- 3.99	+ 45.39	+76 6 53.01
		E	...	14 30 4.0	2 14.1	48.80	50.85	.....	322 48 52.42	+ 0.24	+ 3.03	- 45.40	
4	January 14, L. ϵ Andromedæ	W	2	0 32 32.7	1 9.8	49.05	50.90	.....	349 52 21.62	- 0.02	+10.31	- 11.00	+28 47 50.56
		E	...	0 35 35.7	1 53.2	49.95	51.95	.....	10 7 28.10	+ 0.98	-27.11	+ 11.01	
5	η Cassiopeïæ	E	2	0 41 10.5	2 21.3	49.90	52.30	.....	341 36 13.70	+ 1.12	+14.50	- 20.50	+57 18 54.43
		W	...	0 45 26.0	1 54.2	49.55	51.35	.....	18 23 12.98	+ 0.47	- 9.47	+ 20.50	
6	8 Draconis S. P.	W	4	0 49 50.0	2 1.6	49.50	51.40	.....	75 3 41.05	+ 0.46	+ 2.65	+3 47.91	+65 56 57.72
		E	...	0 53 44.0	1 52.4	49.85	52.05	.....	284 55 49.95	+ 0.97	- 2.26	-3 47.96	
7	Groombridge 2006 S. P.	E	3	1 3 34.0	0 11.4	49.95	52.15	.....	307 5 43.92	+ 1.08	0.00	-1 21.53	+88 9 19.70
		W	...	1 7 50.0	4 4.6	49.65	51.90	.....	52 53 47.52	+ 0.79	+ 1.02	+1 21.55	
8	ϕ Cassiopeïæ	W	2.5	1 17 12.0	2 12.4	49.40	51.45	.....	28 42 18.25	+ 0.44	- 5.89	+ 33.85	+67 38 16.36
		E	...	1 23 51.0	4 26.6	50.00	52.20	.....	331 16 55.95	+ 1.12	+23.91	- 33.85	
9	13 B. Ursæ Minoris S. P.	E	3.5	1 32 16.0	2 46.9	50.25	52.40	.....	290 41 5.45	+ 1.35	- 3.96	-2 42.79	+71 43 16.72
		W	...	1 37 26.0	2 23.1	49.75	51.80	.....	69 18 26.82	+ 0.79	+ 2.91	+2 42.89	
10	δ Draconis S. P.	E	3.5	1 47 32.0	1 16.6	50.50	52.45	.....	284 10 22.45	+ 1.51	- 1.08	-4 1.57	+65 11 19.17
		W	...	1 51 12.0	2 23.4	49.75	51.70	.....	75 49 3.62	+ 0.74	+ 3.78	+4 1.63	
11	α Draconis S. P.	W	4	1 59 22.0	2 36.1	49.40	51.10	.....	76 10 42.15	+ 0.26	+ 4.53	+4 8.19	+64 49 34.82
		E	...	2 4 12.0	2 13.9	50.40	52.50	.....	283 48 48.08	+ 1.48	- 3.33	-4 8.27	
12	4 Ursæ Minoris S. P.	E	3.5	2 8 2.0	1 17.7	50.50	52.60	.....	296 56 28.28	+ 1.58	- 0.60	-2 1.71	+77 59 24.24
		W	...	2 11 58.0	2 38.3	49.70	51.60	.....	63 3 0.98	+ 0.67	+ 2.48	+2 1.73	
13	5 Ursæ Minoris S. P.	W	3	2 25 14.0	2 36.3	49.80	51.55	.....	64 55 21.90	+ 0.70	+ 2.75	+2 12.23	+76 6 53.17
		E	...	2 30 0.0	2 9.7	50.50	52.55	.....	295 4 9.68	+ 1.56	- 1.89	-2 12.23	
14	μ Arietis	E	2.5	2 34 32.5	2 39.0	50.85	52.65	.....	19 18 47.00	+ 1.80	-30.55	+ 21.78	+19 36 22.94
		W	...	2 39 54.5	2 43.0	49.60	51.35	.....	340 40 41.92	+ 0.49	+32.10	- 21.79	
15	β Fornacis	W	4	2 43 4.0	2 13.7	49.15	50.95	.....	288 18 52.45	+ 0.05	+ 6.71	-3 6.13	-32 48 36.32
		E	...	2 47 12.0	1 54.3	50.75	52.80	.....	71 40 35.75	+ 1.81	- 4.91	+3 6.27	
16	λ Ceti	E	3	2 52 49.0	1 59.4	51.00	53.20	.....	30 23 0.68	+ 2.14	-11.82	+ 36.48	+ 8 31 36.37
		W	...	2 57 10.5	2 22.1	49.80	51.55	.....	329 36 26.05	+ 0.70	+16.75	- 36.48	
17	94 Ceti	W	3	3 5 5.0	3 1.5	49.30	51.15	.....	319 31 47.32	+ 0.24	+21.53	- 53.04	- 1 33 14.59
		E	...	3 10 7.0	2 0.5	50.95	52.95	.....	40 27 32.88	+ 2.00	- 9.49	+ 53.04	
18	January 15, L. τ^0 Eridani	W	3	3 53 55.0	2 8.9	49.65	51.75	.....	296 48 57.75	+ 0.64	+ 7.20	-2 1.30	-24 17 25.76
		E	...	3 57 40.0	1 36.1	50.85	53.00	.....	63 10 29.80	+ 1.90	- 4.00	+2 1.30	
19	σ^1 Eridani	E	2.5	4 4 30.0	2 55.2	50.95	53.10	.....	45 59 34.70	+ 2.00	-17.97	+1 3.69	- 7 5 19.40
		W	...	4 9 25.5	2 0.3	49.95	51.95	.....	314 0 4.72	+ 0.90	+ 8.47	-1 3.68	
20	ν^5 Eridani	W	3.5	4 18 4.0	2 35.8	49.50	51.50	.....	286 53 8.68	+ 0.44	+ 8.90	-3 20.50	-34 14 32.62
		E	...	4 22 48.0	2 8.2	50.85	53.05	.....	73 6 19.55	+ 1.92	- 6.02	+3 20.50	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
12 14 2	34.6	...	...							1	359 59 47.00	.....
14 15	34.7	35.7	29.914							2	45.84	.....
14 28	34.6	...	...							3	46.68	.....
14 0 27	24.1	25.0	30.090							4	46.94	.....
0 44	23.6	...	...							5	46.65	-12.03
0 56	23.3	...	...							6	46.38	.....
1 6	23.0	...	...							7	47.18	+16.57
1 20	22.4	23.9	30.108							8	46.89	-13.23
1 35	21.7	...	...							9	46.73	+15.50
1 54	21.0	...	...							10	45.54	+14.49
2 2	20.7	...	...							11	46.54	.....
2 15	20.5	22.1	30.124							12	46.70	.....
2 28	20.3	...	...							13	47.35	.....
2 38	20.6	...	...							14	46.38	+ 3.33
2 46	19.6	...	...							15	46.00	.....
2 56	19.8	...	...							16	47.25	+ 7.66
3 8	20.0	21.2	30.128							17	47.24	+11.30
15 3 56	22.7	23.4	29.998							18	46.64	+18.33
4 7	22.7	...	...							19	46.42	.....
4 21	22.8	...	...							20	46.74	.....

Note.
2. Faint.

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ^5 Eridani	E	3.5	4 29 20.0	2 43.1	50.95	53.15	.....	69 38 9.15	+ 2.02	-10.34	+2 44.68	-30 45 42.38
		W	...	4 34 10.0	2 6.9	49.85	51.80	.....	290 21 25.22	+ 0.77	+ 6.26	-2 44.69	
2	k Tauri	W	2	4 49 36.5	2 55.9	49.10	51.35	.....	345 58 4.15	+ 0.15	+49.14	- 15.40	+24 54 7.60
		E	...	4 54 43.5	2 11.1	50.55	53.00	.....	14 1 6.20	+ 1.74	-27.30	+ 15.40	
3	μ Aurigæ	E	1.5	5 7 .....	.....	50.75	53.00	27.072	0 31 12.80	+ 2.57	+ 0.26	+ 0.59	+38 22 16.24
		W	...	.....	.....	49.80	51.70	27.072	359 25 14.92	+ 1.43	- 0.26	- 0.59	
4	17 Camelop.	W	3	5 18 32.0	2 53.0	49.00	51.00	.....	24 3 34.10	- 0.08	-14.14	+ 27.57	+62 59 17.10
		E	...	5 23 24.0	1 59.0	50.75	53.05	.....	335 50 5.48	+ 1.86	+ 6.69	- 27.58	
5	θ^2 Orionis	E	2.5	5 28 7.0	2 47.9	51.15	53.35	.....	44 23 12.40	+ 2.22	-17.02	+1 0.45	- 5 28 55.10
	January 16, L.	W	3	5 33 14.0	2 19.1	49.30	51.25	.....	315 36 23.25	+ 0.21	+11.68	-1 0.49	
6	γ Ceti	E	2	1 1 9.0	2 50.2	50.45	50.65	.....	49 35 25.60	+ 2.05	-15.86	+1 10.52	-10 41 18.13
		W	...	1 6 5.5	2 6.3	48.95	49.00	.....	310 24 14.25	+ 0.43	+ 8.73	-1 10.55	
7	l Ursæ Minoris S. P.	W	2	1 14 40.0	3 52.0	48.75	48.85	.....	55 48 11.22	+ 0.26	+ 2.29	+1 28.35	+85 14 48.61
		E	...	1 19 16.0	0 44.0	50.30	50.50	.....	304 11 19.10	+ 1.89	- 0.08	-1 28.39	
8	η B. Ursæ Minoris S. P.	E	2.5	1 23 18.0	0 34.0	50.40	50.50	.....	291 50 19.92	+ 1.94	- 0.16	-2 29.21	+72 52 49.21
		W	...	1 27 28.0	3 36.0	49.20	49.45	.....	68 9 4.55	+ 0.80	+ 6.28	+2 29.25	
9	13 B. Ursæ Minoris S. P.	W	2.5	1 32 30.0	2 33.3	49.20	49.35	.....	69 18 30.95	+ 0.75	+ 3.34	+2 38.35	+71 43 17.01
		E	...	1 37 12.0	2 8.7	50.50	50.55	.....	290 40 59.32	+ 2.02	- 2.36	-2 38.40	
10	ϵ Eridani	E	3	3 25 50.0	2 48.8	50.65	51.20	.....	48 41 7.72	+ 2.43	-15.86	+1 8.75	- 9 46 59.65
		W	...	3 30 16.0	1 37.2	49.80	50.20	.....	311 18 32.58	+ 1.48	+ 5.26	-1 8.75	
11	α Persei	W	3	3 38 .....	.....	49.55	49.65	27.134	353 2 19.38	+ 0.35	- 0.21	- 7.36	+31 59 13.09
		E	...	.....	.....	50.80	50.95	27.134	6 54 9.95	+ 1.65	+ 0.21	+ 7.36	
12	γ^9 Eridani	E	4	3 53 22.0	2 42.1	51.30	51.50	.....	63 10 37.38	+ 2.91	-11.38	+1 59.48	-24 17 24.51
		W	...	3 58 16.0	2 11.9	50.20	50.00	.....	296 48 56.60	+ 1.59	+ 7.54	-1 59.53	
13	α^1 Eridani	W	3	4 4 31.0	2 54.4	49.40	49.40	.....	313 59 55.55	+ 0.87	+17.80	-1 2.76	- 7 5 19.15
		E	...	4 9 32.0	2 6.6	50.65	50.90	.....	45 59 27.28	+ 2.27	- 9.38	+1 2.76	
14	ν^8 Eridani	E	3.5	4 17 54.0	2 46.0	51.25	51.30	.....	73 6 27.25	+ 2.80	-10.10	+3 17.72	-34 14 34.35
		W	...	4 23 10.0	2 30.0	49.90	49.90	.....	286 53 3.82	+ 1.38	+ 8.25	-3 17.65	
15	γ^7 Eridani	W	3	4 29 24.0	2 39.3	49.50	49.35	.....	290 21 18.35	+ 0.90	+ 9.86	-2 42.14	-30 45 43.71
		E	...	4 34 9.0	2 5.7	50.85	50.80	.....	69 38 9.32	+ 2.33	- 6.14	+2 42.06	
16	k Tauri	E	2.5	4 50 6.5	2 26.1	51.15	51.25	.....	14 1 11.98	+ 2.71	-33.90	+ 15.13	+24 54 8.31
		W	...	4 54 26.5	1 53.9	50.15	50.10	.....	345 58 32.25	+ 1.61	+20.62	- 15.13	
17	μ Aurigæ	W	2.5	5 7 .....	.....	49.50	49.55	27.366	359 25 5.65	+ 0.27	- 0.26	- 0.58	+38 22 15.46
		E	...	.....	.....	50.85	51.20	27.366	0 31 4.65	+ 1.81	+ 0.26	+ 0.58	
18	17 Camelop.	E	3	5 18 45.0	2 40.2	50.90	51.20	.....	335 55 59.40	+ 2.56	+12.13	- 27.10	+62 59 17.53
		W	...	5 23 25.0	1 59.8	49.85	50.00	.....	24 3 27.15	+ 1.40	- 6.78	+ 27.09	
19	θ^2 Orionis	W	3	5 28 9.0	2 46.1	49.55	49.55	.....	315 36 18.25	+ 1.03	+16.66	- 59.32	- 5 28 54.85
		E	...	5 33 4.0	2 8.9	51.00	51.20	.....	44 23 7.05	+ 2.61	-10.03	+ 59.28	
20	43 H. Cephei S. P.	W	3.5	12 53 8.0	2 46.0	50.55	50.75	.....	55 17 51.05	+ 0.73	+ 1.05	+1 27.80	+85 45 9.08
		E	...	12 58 16.0	2 22.0	50.40	50.50	.....	304 41 40.02	+ 0.52	- 0.77	-1 27.80	

Time.	Ther. 3852.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
15 4 17	22.7	...	29.997	Instrument in meridian, observation at I with movable thread				1	359 59 49.54	+10.25
4 17	22.8	22.9	29.997	Instrument in meridian, observation at IX with movable thread				2	47.04	+ 0.75
5 17	21.8	...	29.994					3	46.78	.....
5 17	20.8	21.7	29.994					4	46.95	.....
16 1 4	12.4	11.3	29.990					5	46.15	+14.20
1 17	12.9	...	...					6	47.48	.....
1 17	11.6	...	...					7	47.12	+16.28
1 17	11.1	12.7	29.990					8	46.68	.....
1 17	10.1	10.2	29.998					9	46.98	+14.04
1 17	9.1	...	...					10	46.80	.....
1 17	8.0	...	...					11	48.12	+ 1.60
1 17	7.0	...	...					12	47.10	+18.50
1 17	6.0	...	...					13	47.20	.....
1 17	5.0	...	...					14	46.74	.....
1 17	4.0	...	...					15	47.27	+19.46
1 17	3.0	...	...					16	47.64	+ 6.76
1 17	2.0	...	...					17	48.14	.....
1 17	1.0	...	...					18	47.92	.....
1 17	0.0	...	...					19	48.06	+11.85
1 17	...	...	...					20	46.10	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Groombridge 2006	W E	3 ...	13 3 24.0 13 7 54.0	0 23.4 4 6.6	50.90 50.45	50.70 50.35	..... .....	49 12 36.12 310 46 53.80	+ 0.87 + 0.46	- 0.01 + 1.10	+1 10.53 -1 10.55	+88 9 17.94
2	1 Ursæ Minoris	E W	3 ...	13 15 2.0 13 19 10.0	3 30.3 0 37.7	50.30 50.90	50.35 50.05	..... .....	313 41 16.58 46 18 11.78	+ 0.40 + 0.85	+ 2.15 - 0.07	-1 3.75 +1 3.80	+85 14 47.08
3	9 B. Ursæ Minoris	W E	3 ...	13 23 12.0 13 27 38.0	0 40.1 3 45.9	51.05 50.50	50.65 50.40	..... .....	33 56 36.50 326 2 44.75	+ 0.93 + 0.51	- 0.36 + 11.41	+ 41.07 - 41.07	+72 52 47.86
4	13 B. Ursæ Minoris	E W	3 ...	13 32 32.0 13 37 24.0	2 31.5 2 20.5	50.30 50.85	50.10 50.65	..... .....	327 12 20.10 32 47 10.40	+ 0.26 + 0.83	+ 5.64 - 4.85	- 39.29 + 39.30	+71 43 16.07
5	50 Cassiopeiæ s. p.	W E	3 ...	13 52 26.0 13 57 32.0	3 5.2 2 0.8	50.50 50.40	50.40 50.35	..... .....	69 3 50.88 290 55 39.70	+ 0.52 + 0.45	+ 4.83 - 2.06	+2 38.60 -2 38.62	+71 57 55.73
6	4 Ursæ Minoris	W E	2.5 ...	14 6 58.0 14 11 23.0	2 22.4 2 2.6	50.75 50.30	50.65 50.20	..... .....	39 3 5.55 320 56 26.70	+ 0.78 + 0.31	- 2.84 + 2.11	+ 49.57 - 49.57	+77 59 23.35
7	ε Cassiopeiæ s. p. (brightest)	W E	3 ...	14 17 18.0 14 21 52.0	4 8.4 0 25.6	50.55 50.25	50.45 50.05	..... .....	74 2 3.58 285 57 17.95	+ 0.58 + 0.22	+ 10.65 - 0.11	+3 31.05 -3 31.04	+66 58 43.99
8	5 Ursæ Minoris	E W	2.5 ...	14 25 34.0 14 30 15.0	2 16.9 2 24.1	50.25 50.45	50.20 50.45	..... .....	322 48 53.42 37 10 38.50	+ 0.28 + 0.51	+ 3.16 - 3.50	- 46.32 + 46.30	+76 6 52.23
9	118 H ¹ . Cassiopeiæ s. p.	W E	3.5 ...	14 34 16.0 14 38 37.0	2 35.4 1 45.6	50.65 50.35	50.40 50.40	..... .....	73 35 32.70 286 23 56.68	+ 0.60 + 0.44	+ 4.10 - 1.89	+3 24.99 -3 25.01	+67 25 27.33
10	β Ursæ Minoris	E W	2.5 ...	14 48 33.0 14 53 18.0	2 33.5 2 11.5	50.20 50.75	50.05 50.55	..... .....	324 23 17.75 35 36 14.12	+ 0.19 + 0.72	+ 4.58 - 3.36	- 43.73 + 43.74	+74 32 24.81
11	ε Andromedæ	E W	2.5 ...	0 31 45.0 0 34 41.0	1 58.1 0 57.9	48.10 49.95	49.95 51.45	..... .....	10 7 32.12 349 52 21.12	- 0.21 + 1.50	- 29.50 + 7.10	+ 10.48 - 10.47	+28 47 49.77
12	η Cassiopeiæ	W E	2 ...	0 41 8.0 0 44 19.0	2 24.4 0 46.6	49.60 48.15	51.05 49.80	..... .....	18 23 18.12 341 36 25.80	+ 1.12 - 0.27	- 15.14 + 1.57	+ 19.51 - 19.52	+57 18 54.61
13	43 H. Cephei	W E	2 ...	0 52 32.0 0 57 31.0	3 21.9 1 37.1	49.05 49.05	50.45 50.55	..... .....	46 48 34.08 313 10 57.22	+ 0.53 + 0.59	- 1.76 + 0.41	+1 2.57 -1 2.63	+85 45 6.51
14	44 H. Cephei	E W	...	1 1 40.0 1 6 4.0	2 35.4 1 48.6	49.10 49.05	50.55 50.60	..... .....	319 45 28.32 40 14 1.70	+ 0.62 + 0.63	+ 2.99 - 1.46	- 49.80 + 49.83	+79 10 20.87
15	ψ Cassiopeiæ	E W	2.5 ...	1 16 9.0 1 20 17.0	3 15.9 0 52.1	49.30 49.05	50.80 50.80	..... .....	331 17 5.22 28 42 14.00	+ 0.84 + 0.69	+ 12.89 - 0.91	- 32.27 + 32.27	+67 38 16.27
16	9 B. Ursæ Minoris s. p.	W E	2.5 ...	1 23 42.0 1 28 6.0	0 10.5 4 13.5	49.10 49.10	50.60 50.65	..... .....	68 9 12.48 291 50 26.12	+ 0.63 + 0.65	+ 0.01 - 8.65	+2 26.06 -2 26.01	+72 52 49.87
17	ω Cassiopeiæ	E W	...	1 32 44.0 1 38 2.0	2 46.1 2 31.9	49.05 49.00	50.85 50.70	..... .....	331 21 27.32 28 38 1.70	+ 0.75 + 0.65	+ 9.32 - 7.80	- 32.16 + 32.17	+67 33 57.33
18	50 Cassiopeiæ	W E	2.5 ...	1 51 31.0 1 56 2.0	4 0.4 0 30.6	49.05 49.15	50.65 50.85	..... .....	33 2 0.05 326 57 44.05	+ 0.66 + 0.80	- 13.92 + 0.23	+ 38.40 - 38.41	+71 57 55.85
19	ζ ¹ Ceti	E W	3 ...	2 5 50.0 2 9 53.0	2 19.3 1 43.7	49.65 49.25	51.20 50.90	..... .....	30 30 44.60 329 28 53.55	+ 1.21 + 0.86	- 16.04 + 8.89	+ 34.82 - 34.82	+ 8 23 58.53
20	ε Cassiopeiæ (brightest)	W E	3 ...	2 17 11.5 2 21 57.0	4 15.1 0 30.4	49.00 49.45	50.45 50.95	..... .....	28 3 2.92 331 56 50.48	+ 0.51 + 1.00	- 22.95 + 0.33	+ 31.48 - 31.48	+66 58 42.41

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
16 13 6	26.4	...	...							1	359 59 46.16	+16.56
13 22	25.7	...	...							2	35.87	+16.30
13 35	25.7	...	...							3	46.87	.....
13 55	25.1	26.5	29.926							4	46.20	+15.69
14 10	25.1	...	...							5	47.15	.....
14 21	24.9	...	...							6	46.10	.....
14 29	25.6	...	...							7	46.44	.....
14 37	25.5	...	...							8	46.18	.....
14 51	25.3	27.3	29.940							9	46.30	-10.06
18 0 35	44.9	46.3	29.956							10	47.00	.....
0 43	44.6	...	...							11	46.07	.....
0 55	43.3	...	...							12	45.60	-11.69
1 5	42.6	...	...							13	45.50	.....
1 10	42.3	...	...							14	46.42	-15.39
1 31	42.6	44.3	29.952							15	46.36	-13.11
1 36	42.6	...	...							16	45.64	.....
1 55	41.3	...	...							17	45.98	.....
2 20	41.3	...	...							18	45.93	.....
										19	46.54	.....
										20	46.14	.....

Notes.
16. Faint.
18, 19 B. Faint; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	5 Ursæ Minoris s. p.	E	3.5	2 25 40.0	2 11.4	49.45	51.00	.....	295 4 2.98	+ 1.04	- 1.94	-2 5.71	+76 6 53.05
		W	...	2 29 39.0	1 47.6	49.20	50.80	.....	64 55 29.20	+ 0.80	+ 1.30	+2 5.79	
2	118 H ¹ . Cassiopeiæ	W	...	2 37 28.0	0 36.4	49.30	50.60	.....	28 29 23.15	+ 0.75	- 0.45	+ 32.15	+67 25 26.19
		E	...	2 41 37.0	4 45.4	49.55	50.80	.....	331 29 39.82	+ 0.98	+27.80	- 32.20	
3	β Ursæ Minoris s. p.	E	3	2 49 32.0	1 34.9	49.45	50.85	.....	293 29 43.62	+ 0.96	- 1.11	-2 15.59	+74 32 25.72
		W	...	2 53 21.0	2 14.1	49.05	50.45	.....	66 29 44.92	+ 0.55	+ 2.22	+2 15.57	
4	12 Eridani	E	3	3 5 23.0	2 50.7	49.80	51.50	.....	68 14 44.82	+ 1.44	-11.60	+2 27.63	-29 21 59.65
		W	...	3 10 9.0	1 55.3	49.25	50.55	.....	291 44 51.45	+ 0.69	+ 5.29	-2 27.63	
5	τ ¹ Arietis	W	3	3 13 52.0	2 4.4	48.70	50.10	.....	341 52 42.90	+ 0.16	+19.74	- 19.41	+20 48 13.96
		E	...	3 17 51.0	1 54.6	49.05	51.00	.....	18 6 44.88	+ 1.11	-16.75	+ 19.41	
6	τ ² Eridani	E	3	3 27 2.0	2 45.2	49.90	51.20	.....	60 50 48.25	+ 1.35	-12.29	+1 45.93	-21 57 21.09
		W	...	3 31 55.0	2 7.8	49.05	50.30	.....	299 8 45.95	+ 0.45	+ 7.36	-1 45.89	
7	δ Eridani	W	3	3 36 11.0	2 42.7	48.90	50.10	.....	311 0 4.88	+ 0.30	+14.65	-1 8.08	-10 5 18.17
		E	...	3 41 3.0	2 9.3	49.75	50.95	.....	48 59 21.28	+ 1.16	- 9.25	+1 8.09	
8	44 H. Cephei s. p.	E	4	13 2 48.0	1 27.4	49.80	50.35	.....	298 7 15.95	+ 0.35	- 0.69	-1 51.41	+79 10 21.65
		W	3.5	13 7 34.0	3 18.6	50.00	50.85	.....	61 52 12.02	+ 0.69	+ 3.57	+1 51.43	
9	ι Ursæ Minoris	W	4	13 15 56.0	2 37.2	50.15	50.90	.....	46 18 13.60	+ 0.79	- 1.20	+1 2.52	+85 14 46.23
		E	...	13 22 20.0	3 46.8	50.15	50.40	.....	313 41 15.90	+ 0.55	+ 2.50	-1 2.53	
10	4 Ursæ Minoris	E	2.5	14 6 53.0	2 28.0	50.90	51.30	.....	320 56 23.72	+ 1.38	+ 3.07	- 48.47	+77 59 23.21
		W	...	14 12 54.0	3 33.0	50.85	51.30	.....	39 3 9.48	+ 1.36	- 6.36	+ 48.47	
11	36 H. Cassiopeiæ s. p.	E	3	14 27 2.0	2 10.7	51.00	51.75	.....	291 21 58.68	+ 1.68	- 2.35	-2 31.70	+72 24 24.03
		W	...	14 32 20.0	3 7.3	50.75	51.35	.....	68 37 27.22	+ 1.34	+ 4.83	+2 31.69	
12	β Ursæ Minoris	W	2.5	14 48 30.0	2 37.1	50.30	50.35	.....	35 36 15.70	+ 0.60	- 4.79	+ 42.83	+74 32 24.16
	January 19, L.	E	...	14 53 29.0	2 21.9	50.70	50.85	.....	324 23 17.05	+ 1.07	+ 3.91	- 42.83	
13	44 H. Cephei s. p.	W	1.5	13 1 25.0	2 50.5	49.75	50.95	.....	61 52 14.42	+ 0.77	+ 2.63	+1 50.01	+79 10 21.50
		E	2.5	13 6 18.0	2 2.5	50.60	51.50	.....	298 7 13.85	+ 1.49	- 1.36	-1 49.98	
14	φ Cassiopeiæ s. p.	E	3	13 15 5.0	4 20.1	50.35	51.35	.....	286 36 42.35	+ 1.28	-11.39	-3 15.20	+67 38 15.40
		W	...	13 19 5.0	0 20.1	49.80	51.00	.....	73 22 56.78	+ 0.82	+ 0.07	+3 15.33	
15	38 Cassiopeiæ s. p.	W	3	13 22 44.0	1 37.5	49.80	50.90	.....	71 14 47.80	+ 0.77	+ 1.47	+2 52.16	+69 46 47.36
		E	...	13 27 50.0	3 28.5	50.05	51.15	.....	288 44 47.95	+ 1.03	- 6.73	-2 52.16	
16	ω Cassiopeiæ s. p.	E	3	13 32 38.0	2 52.3	50.20	51.10	.....	286 32 21.55	+ 1.08	- 5.01	-3 16.20	+67 33 58.64
		W	...	13 37 40.0	2 9.7	49.80	51.00	.....	73 27 11.10	+ 0.82	+ 2.84	+3 16.23	
17	50 Cassiopeiæ s. p.	E	3	13 52 22.0	3 9.6	49.80	51.05	.....	290 55 35.35	+ 0.85	- 5.06	-2 33.15	+71 57 55.45
		W	...	13 57 26.0	1 54.4	49.50	50.95	.....	69 3 58.28	+ 0.64	+ 1.84	+2 33.17	
18	55 Cassiopeiæ s. p.	W	3	14 4 14.0	2 50.9	49.30	50.25	.....	74 55 50.05	+ 0.19	+ 5.76	+3 36.06	+66 4 58.50
		E	...	14 9 47.0	2 33.1	49.60	50.95	.....	285 3 41.75	+ 0.69	- 4.18	-3 36.05	
19	ε Cassiopeiæ s. p. (brightest)	E	3.5	14 17 40.0	3 46.9	49.65	50.90	.....	285 57 17.90	+ 0.60	- 8.88	-3 23.73	+66 58 44.62
		W	...	14 21 52.0	0 25.1	49.40	50.85	.....	74 2 19.08	+ 0.54	+ 0.11	+3 23.84	
20	36 H. Cassiopeiæ s. p.	W	3.5	14 26 22.0	2 50.8	49.15	50.25	.....	68 37 30.30	+ 0.11	+ 4.02	+2 29.93	+72 24 25.01
		E	...	14 31 10.0	1 57.2	49.50	50.65	.....	291 21 58.90	+ 0.49	- 1.89	-2 29.96	

Time.	Ther. 3892.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
28 2 28	41.0	...	...							1	359 59 46.73	.....
2 42	39.3	41.8	29.949							2	46.00	-10.17
2 52	39.6	...	...							3	45.57	.....
1 7	39.1	...	...							4	46.04	.....
1 21	39.1	...	...							5	46.02	.....
1 39	39.6	...	...							6	45.56	.....
1 44	39.2	41.1	29.928							7	46.52	.....
1 5	31.3	32.8	29.662							8	45.96	15.16
1 21	31.0	...	...							9	46.06	+16.17
14 16	31.3	32.6	29.660							10	46.12	.....
14 16	31.3	...	...							11	45.70	.....
14 52	30.9	32.1	29.658							12	46.77	.....
1 14	16.4	38.0	29.662							13	45.92	-15.47
13 14	16.7	...	...							14	44.98	-11.09
14 16	16.7	...	...							15	46.14	.....
14 7	16.7	...	...							16	46.20	.....
14 16	16.8	37.7	29.611							17	45.96	.....
14 16	36.2	...	...							18	47.14	.....
										19	44.78	.....
										20	45.95	.....

Notes.

2. Poor observation.

9. Very faint; poor observation.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>/ "</i>	<i>° / "</i>
1	118 H ¹ . Cassiopeiæ s. P.	E	...	14 36 18.0	0 33.9	49.55	50.80	.....	286 23 47.72	+ 0.59	- 0.20	-3 18.14	+67 25 27.22
		W	...	14 39 52.0	3 0.1	49.40	50.95	.....	73 35 38.25	+ 0.59	+ 5.51	+3 18.02	
2	47 H. Cephei s. P.	W	3	14 50 42.0	2 59.2	49.00	50.15	.....	61 59 46.95	- 0.03	+ 2.93	+1 50.69	+79 2 50.26
		E	...	14 55 40.0	2 4.8	49.40	50.00	.....	297 59 45.95	+ 0.41	- 1.42	-1 50.73	
3	48 H. Cephei s. P.	E	3	15 5 32.0	2 57.8	49.25	50.65	.....	296 20 26.05	+ 0.36	- 3.27	-1 58.84	+77 23 21.58
	January 20, L.	W	...	15 9 24.0	0 54.2	49.00	50.25	.....	63 39 8.80	+ 0.03	+ 0.30	+1 58.85	
4	β Ceti	W	2.5	0 36 7.0	2 53.2	48.05	49.75	.....	302 35 7.48	+ 1.14	+14.32	-1 30.87	-18 30 39.80
		E	...	0 41 11.0	2 10.8	48.60	50.30	.....	57 24 20.38	+ 1.72	- 8.17	+1 30.91	
5	44 H. Cephei	W	3	1 1 20.0	2 55.5	47.25	48.95	.....	40 14 7.78	+ 0.31	- 3.80	+ 49.37	+79 10 21.71
		E	...	1 6 28.0	2 12.5	48.35	50.00	.....	319 45 29.20	+ 1.42	+ 2.17	- 49.39	
6	α Ursæ Minoris	E	2.5	1 13 4.0	12 8.2	48.30	50.05	.....	310 7 50.42	+ 1.41	+ 6.12	-1 9.18	+88 48 15.69
		W	...	1 17 8.0	8 4.2	47.75	49.50	.....	49 51 39.65	+ 0.85	- 2.71	+1 9.20	
7	38 Cassiopeiæ	W	...	1 21 24.0	2 57.5	47.25	49.00	.....	30 50 51.40	+ 0.35	- 9.01	+ 34.90	+69 46 46.34
		E	...	1 26 27.0	2 5.5	48.15	49.90	.....	329 8 47.25	+ 1.27	+ 4.50	- 34.91	
8	ω Cassiopeiæ	W	2.5	1 32 26.0	3 4.3	47.35	49.00	.....	28 38 7.78	+ 0.39	-11.47	+ 31.92	+67 33 57.38
		E	...	1 37 27.0	1 56.7	48.30	50.00	.....	331 21 32.95	+ 1.39	+ 4.60	- 31.93	
9	50 Cassiopeiæ	E	3	1 51 9.5	4 22.1	48.60	50.20	.....	326 57 28.40	+ 1.66	+16.54	- 38.05	+71 57 56.26
		W	...	1 55 4.0	0 27.6	48.15	49.95	.....	33 1 48.75	+ 1.28	- 0.18	+ 38.05	
10	α Draconis s. P.	E	4	1 59 22.0	2 37.5	48.65	50.20	.....	283 48 33.92	+ 1.68	- 4.61	-3 53.98	+64 49 33.16
		W	...	2 4 4.0	2 4.5	47.90	49.45	.....	76 10 59.70	+ 0.91	+ 2.88	+3 54.03	
11	4 Ursæ Minoris s. P.	W	3	2 7 51.0	1 30.3	47.70	49.20	.....	63 3 11.32	+ 0.60	+ 0.81	+1 54.78	+77 59 23.96
		E	...	2 11 26.0	2 4.7	48.55	50.05	.....	296 56 23.45	+ 1.56	- 1.54	-1 54.79	
12	ϵ Cassiopeiæ (brightest)	E	2.5	2 18 23.0	3 3.9	48.60	50.15	.....	331 56 39.42	+ 1.63	+11.93	- 31.22	+66 58 43.42
		W	...	2 22 39.0	1 12.1	48.00	49.60	.....	28 2 45.00	+ 1.04	- 1.83	+ 31.22	
13	36 H. Cassiopeiæ	W	2.5	2 26 23.0	2 49.8	47.80	49.45	.....	33 28 21.32	+ 0.87	- 6.70	+ 38.76	+72 24 22.94
		E	...	2 31 12.0	1 59.2	48.60	50.20	.....	326 31 15.32	+ 1.66	+ 3.30	- 38.76	
14	118 H ¹ . Cassiopeiæ	E	2	2 35 24.0	1 27.9	48.70	50.30	.....	331 30 5.25	+ 1.75	+ 2.64	- 31.83	+67 25 26.64
		W	...	2 39 39.0	2 47.1	48.35	49.60	.....	28 29 34.40	+ 1.21	- 9.53	+ 31.84	
15	β Ursæ Minoris s. P.	W	3	2 48 24.0	2 43.4	47.80	49.40	.....	66 29 47.12	+ 0.83	+ 3.29	+2 14.29	+74 32 25.68
		E	...	2 53 10.0	2 2.6	48.65	50.40	.....	293 29 44.45	+ 1.77	- 1.85	-2 14.32	
16	48 H. Cephei	E	2	3 5 50.0	2 39.8	49.10	50.50	.....	321 32 25.48	+ 2.08	+ 3.80	- 46.63	+77 23 20.34
		W	...	3 10 58.0	2 28.2	48.30	49.65	.....	38 27 7.65	+ 1.22	- 3.27	+ 46.64	
17	σ Tauri	W	3	3 17 8.0	2 46.1	47.95	49.45	.....	329 46 15.72	+ 0.95	+22.99	- 34.25	+ 8 41 32.85
		E	...	3 22 5.5	2 11.4	49.20	50.55	.....	30 13 10.82	+ 2.14	-14.38	+ 34.29	
18	τ^5 Eridani	W	3.5	3 27 2.0	2 45.6	48.30	49.65	.....	299 8 41.65	+ 1.22	+12.36	-1 45.33	-21 57 22.22
		E	...	3 32 5.0	2 17.4	49.50	50.70	.....	60 50 48.22	+ 2.37	- 8.51	+1 45.42	
19	δ Eridani	E	3.5	3 36 36.0	2 18.1	49.80	50.80	.....	48 59 23.40	+ 2.58	-10.56	+1 7.81	-10 5 18.56
	January 22, L.	W	...	3 41 9.0	2 14.9	48.60	49.70	.....	311 0 9.32	+ 1.40	+10.07	-1 7.84	
20	α Ursæ Minoris s. P.	W	2.5	13 13 56.0	11 13.8	48.90	49.55	.....	52 14 48.78	- 0.08	+ 5.07	+1 18.00	+88 48 17.87
		E	...	13 18 16.0	6 53.8	49.05	49.80	.....	307 44 42.25	+ 0.13	- 1.91	-1 18.90	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° / "</i>	<i>"</i>
19 14 40	37.0	...	...					1	359 59 46.17	-10.30
14 54	36.4	...	...					2	47.38	
15 12	36.4	37.4	29.652					3	46.14	
20 0 39	44.6	46.2	29.740					4	48.46	
1 4	43.6	...	...					5	48.63	15.25
1 20	43.3	...	...					6	47.88	
1 36	42.9	...	...					7	47.88	
1 54	42.6	...	...					8	47.82	
1 58	42.4	...	...					9	48.22	
2 15	42.2	...	...					10	47.26	
2 21	42.1	...	...					11	48.14	
2 36	41.7	...	...					12	48.60	
2 51	41.2	43.4	29.774					13	47.88	
3 9	41.2	...	...					14	47.86	-10.34
3 20	40.3	...	...					15	47.79	
3 30	39.3	...	...					16	48.48	
3 40	38.7	41.3	29.778					17	49.14	
22 13 12	25.9	27.6	30.022					18	48.70	
								19	48.09	
								20	47.12	

Notes.

3.5. Faint.
17 E. One microscope reading decreased 10".

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	40 Cassiopeia S. P.	W E	2.5 ...	13 29 34.0 13 35 2.0	1 33.8 3 54.2	49.00 49.50	49.65 50.25	.....	68 28 18.38 291 31 21.15	+ 0.03 + 0.58	+ 1.20 - 7.50	+ 2 34.13 - 2 34.11	+ 72 33 36.61
2	2 H. Ursæ Minoris	E W	3 ...	14 52 36.5 14 58 21.0	3 38.3 2 6.2	50.25 50.55	50.75 51.05	.....	332 36 51.20 27 22 29.25	+ 1.23 + 1.54	+ 17.66 - 5.91	- 31.75 + 31.75	+ 66 18 25.72
3	1 H. Ursæ Minoris	W E	3 ...	15 11 56.0 15 15 48.0	1 46.9 2 5.1	49.75 49.60	50.30 50.15	.....	28 46 13.60 331 13 18.68	+ 0.74 + 0.58	- 3.82 + 5.23	+ 33.60 - 33.70	+ 67 42 13.29
4	January 23, L. α Ursæ Minoris	W E	2.5 ...	1 22 52.0 1 26 8.0	2 17.3 0 58.7	50.90 48.05	52.90 49.75	.....	49 51 31.48 310 8 0.58	+ 3.28 + 0.24	- 0.22 + 0.04	+ 11.78 - 11.81	+ 88 48 15.21
5	40 Cassiopeia	E W	2.5 ...	1 29 18.0 1 33 21.0	1 49.9 2 13.1	48.20 51.30	49.85 53.00	.....	326 22 6.38 33 37 25.98	+ 0.34 + 3.54	+ 2.77 - 4.07	- 40.35 + 40.36	+ 72 33 34.91
6	2 Persei	W E	2.5 ...	1 44 14.7 1 47 36.7	2 4.5 1 17.5	49.80 49.35	51.20 50.85	.....	11 24 10.55 348 35 34.02	+ 1.86 + 1.44	- 21.24 + 8.23	+ 12.26 - 12.26	+ 50 19 32.57
7	55 Cassiopeia	E W	2.5 ...	2 4 30.0 2 9 12.0	2 44.4 1 57.6	49.40 50.05	50.60 51.25	.....	332 50 28.10 27 9 0.30	+ 1.36 + 2.01	+ 10.19 - 5.21	- 31.17 + 31.17	+ 66 4 56.47
8	36 H. Cassiopeia	E W	3 ...	2 26 52.0 2 30 59.0	2 21.2 1 45.8	49.75 50.40	51.25 51.55	.....	326 31 16.20 33 28 15.00	+ 1.85 + 2.35	+ 4.64 - 2.60	- 40.18 + 40.19	+ 72 24 22.79
9	η Persei	W E	2.5 ...	2 41 15.0 2 45 51.0	2 43.7 1 52.3	49.90 49.55	51.20 50.55	.....	16 34 46.42 343 24 57.30	+ 1.92 + 1.40	- 22.56 + 10.62	+ 18.11 - 18.11	+ 55 30 12.91
10	47 H. Cephei	E W	3 ...	2 51 36.0 2 55 58.0	2 5.5 2 16.5	49.55 49.90	50.70 51.05	.....	319 53 4.05 40 6 30.22	+ 1.48 + 1.84	+ 1.97 - 2.33	- 51.22 + 51.23	+ 79 2 48.91
11	January 27, L. α Ursæ Minoris	W E	2.5 ...	1 13 48.0 1 18 40.0	1 17.9 6 25.9	49.90 50.60	50.50 51.55	.....	49 51 39.18 310 7 55.85	+ 1.26 + 2.16	- 5.31 + 1.73	+ 11.10 - 11.14	+ 88 48 15.38
12	2 Persei	E W	2.5 ...	1 43 23.5 1 48 21.0	2 56.4 2 1.1	50.90 50.30	51.85 51.25	.....	348 34 58.52 11 24 9.72	+ 2.47 + 1.84	+ 42.61 - 20.10	- 12.16 + 12.15	+ 50 19 32.64
13	55 Cassiopeia	W E	3 ...	2 4 16.0 2 9 16.5	2 59.0 2 1.5	50.55 51.10	49.75 50.45	.....	27 9 6.30 332 50 30.75	+ 1.89 + 2.53	- 12.07 + 5.56	+ 30.93 - 30.95	+ 66 4 56.14
14	142 H ¹ . Cephei	E W	3 ...	2 31 22.0 2 36 12.0	2 56.9 1 53.1	51.00 50.50	50.60 49.80	.....	317 52 53.82 42 6 36.38	+ 2.54 + 1.88	+ 3.08 - 1.26	- 54.55 + 54.56	+ 81 2 59.90
15	α Arietis	W E	3 ...	2 44 9.5 2 48 20.5	2 18.6 1 52.4	50.05 51.15	49.45 50.55	.....	335 46 0.28 24 13 26.25	+ 1.47 + 2.59	+ 19.21 - 12.64	- 27.19 + 27.20	+ 14 41 21.74
16	2 H. Ursæ Minoris S. P.	E W	4 ...	2 54 0.0 2 58 26.0	2 15.9 2 10.1	50.85 50.10	50.60 49.50	.....	285 17 8.60 74 42 23.98	+ 2.46 + 1.54	- 3.26 + 2.99	- 3 37.95 + 3 37.98	+ 66 18 25.12
17	48 H. Cephei	W E	3 ...	3 4 10.0 3 8 14.0	4 20.6 0 16.6	50.35 51.25	49.90 50.95	.....	38 27 13.08 321 32 29.02	+ 1.86 + 2.86	- 10.11 + 0.04	+ 47.98 - 48.00	+ 77 23 21.00
18	1 H. Ursæ Minoris S. P.	E W	4 ...	3 12 24.0 3 16 4.0	1 20.0 2 20.0	51.05 49.95	50.90 49.85	.....	286 40 36.80 73 18 52.95	+ 2.72 + 1.63	- 1.08 + 3.29	- 3 10.46 + 3 19.50	+ 67 42 14.24
19	θ Ursæ Minoris S. P.	W E	4 ...	3 31 16.0 3 35 26.0	3 6.2 1 3.8	49.80 51.05	49.25 50.95	.....	63 22 41.12 296 36 48.05	+ 1.25 + 2.75	+ 3.52 - 0.41	+ 2 0.23 - 2 0.21	+ 77 39 45.47
20	ε Eridani	E W	3.5 ...	3 41 6.0 3 45 51.0	2 41.9 2 3.1	51.35 49.70	51.15 49.20	.....	63 3 41.70 296 55 55.28	+ 3.00 + 1.16	- 11.38 + 6.58	+ 1 58.50 - 1 58.45	- 24 10 27.06

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>or h m</i>	<i>"</i>	<i>"</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
23 13 12	26.0							1	359 59 46.93	
14 12	25.4	25.8	30.034					2	47.48	+ 13.00
14 15	25.1							3	47.50	
15 15	24.7	25.7	30.042					4	47.68	
20 1 25	29.0							5	47.48	
1 13	29.0	30.6	29.971					6	47.41	- 8.05
1 13	28.4							7	48.38	
2 7	28.4							8	48.72	
2 29	28.1	29.9	29.972					9	47.55	- 7.47
2 43	28.2							10	48.62	
1 8	27.7	29.4	29.975					11	47.42	
1 13	27.0	32.9	29.931					12	47.52	- 7.69
1 16	26.4							13	47.47	
2 10	29.2	30.7	29.810					14	48.22	- 11.02
2 15	28.7							15	48.58	
2 47	28.4							16	48.17	+ 13.53
2 57	28.4							17	48.16	
3 7	28.1							18	48.18	
3 20	27.8	29.7	29.791					19	48.15	+ 12.11
3 34	27.7							20	48.20	+ 19.67

Notes.
1. Clouds.
8. Paint, clouds.
10. Paint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	ϕ Tauri	W	3	3 58 31.0	2 50.8	48.90	48.60	.....	349 48 17.80	+ 0.46	+ 1 1.38	- 10.87	+28 44 37.30
	January 28, L.	E	...	4 3 24.7	2 2.9	51.25	51.20	.....	10 10 45.25	+ 2.99	- 31.80	+ 10.86	
2	α Ursæ Minoris s. P.	E	2.5	13 22 12.0	2 52.8	51.20	50.10	.....	307 44 41.52	+ 0.79	- 0.33	- 1 21.30	+88 48 16.96
		W	...	13 26 4.0	0 59.2	51.25	50.15	.....	52 14 51.45	+ 0.83	+ 0.04	+ 1 21.32	
3	ω Cassiopeiæ s. P.	W	3.5	13 32 38.0	2 53.6	51.50	50.15	.....	73 26 53.30	+ 0.96	+ 5.09	+ 3 29.91	+67 34 0.14
		E	...	13 38 2.0	2 30.4	51.20	50.15	.....	286 32 35.65	+ 0.81	- 3.82	- 3 29.98	
4	55 Cassiopeiæ s. P.	E	3.5	14 4 46.0	2 29.2	50.85	49.65	.....	285 3 56.22	+ 0.36	- 3.96	- 3 51.38	+66 4 58.14
		W	...	14 9 46.0	2 30.8	51.15	50.15	.....	74 55 35.58	+ 0.77	+ 4.05	+ 3 51.44	
5	142 H ¹ . Cephei s. P.	W	3	14 31 14.0	3 5.1	51.10	49.65	.....	59 59 36.95	+ 0.49	+ 2.61	+ 1 49.21	+81 3 1.36
		E	...	14 36 9.0	1 49.9	51.00	49.70	.....	299 59 54.80	+ 0.47	- 0.92	- 1 49.24	
6	47 H. Cephei s. P.	E	2.5	14 50 48.0	2 54.0	50.75	49.65	.....	297 59 55.65	+ 0.31	- 2.77	- 1 58.68	+79 2 50.99
		W	...	14 56 26.0	2 44.0	50.95	49.70	.....	61 59 37.78	+ 0.44	+ 2.45	+ 1 58.74	
7	48 H. Cephei s. P.	W	3	15 3 33.0	4 57.8	50.65	49.35	.....	63 38 50.15	+ 0.12	+ 9.16	+ 2 7.50	+77 23 22.88
		E	...	15 8 36.0	0 5.2	51.00	49.65	.....	296 20 32.88	+ 0.45	- 0.00	- 2 7.51	
8	1 H. Ursæ Minoris	E	3	15 12 54.0	0 50.4	50.85	49.60	.....	331 13 25.45	+ 0.35	+ 0.85	- 34.79	+67 42 11.96
		W	...	15 16 38.0	2 53.6	50.60	49.30	.....	28 46 17.88	+ 0.08	- 10.08	+ 34.79	
9	θ Ursæ Minoris	W	2.5	15 31 43.0	2 39.7	50.70	49.35	.....	38 43 27.70	+ 0.14	- 3.70	+ 50.79	+77 39 44.70
	January 30, L.	E	...	15 36 22.0	1 59.3	51.00	49.65	.....	321 16 6.95	+ 0.44	+ 2.06	- 50.79	
10	142 H ¹ . Cephei	W	2.5	2 31 20.0	2 59.2	49.95	50.05	.....	42 6 35.60	+ 0.53	- 3.16	+ 56.34	+81 2 59.30
		E	...	2 36 11.0	1 51.8	50.35	50.50	.....	317 52 57.98	+ 0.96	+ 1.23	- 56.34	
11	η Persei	E	3	2 41 11.5	2 48.4	50.50	50.85	.....	343 24 45.32	+ 1.21	+ 23.88	- 18.57	+55 30 12.44
		W	...	2 45 54.5	1 54.6	50.00	50.10	.....	16 34 35.50	+ 0.59	- 11.06	+ 18.57	
12	47 H. Cephei	W	2.5	2 50 37.0	3 5.2	49.75	49.90	.....	40 6 31.05	+ 0.36	- 4.30	+ 52.54	+79 2 48.81
		E	...	2 55 52.0	2 9.8	50.30	50.45	.....	319 53 4.68	+ 0.91	+ 2.11	- 52.55	
13	1 H. Ursæ Minoris s. P.	W	4	3 11 8.0	2 36.8	50.00	50.00	.....	73 18 45.25	+ 0.53	+ 4.13	+ 3 26.07	+67 42 14.70
		E	...	3 16 14.0	2 29.2	50.30	50.40	.....	286 40 47.45	+ 0.89	- 3.74	- 3 26.10	
14	10 Tauri	E	3.5	3 29 20.0	2 55.5	51.20	51.00	.....	38 48 41.90	+ 1.66	- 20.85	+ 50.27	+ 0 5 50.61
		W	...	3 34 7.0	1 51.5	51.00	50.75	.....	321 11 1.50	+ 1.42	+ 8.42	- 50.26	
15	τ^7 Eridani	W	3	3 41 20.0	2 28.5	49.95	49.75	.....	296 55 57.70	+ 0.36	+ 9.57	- 2 2.57	-24 10 26.74
		E	...	3 46 4.0	2 15.5	50.25	50.25	.....	63 3 36.25	+ 0.78	- 7.97	+ 2 2.61	
16	ϕ Tauri	E	2.5	3 58 34.3	2 48.1	51.45	51.00	.....	10 11 11.40	+ 1.79	- 59.47	+ 11.26	+28 44 37.38
	February 4, L.	W	...	4 3 18.7	1 56.3	50.45	49.80	.....	349 48 48.75	+ 0.67	+ 28.48	- 11.28	
17	ξ^1 Ceti	W	3	2 7 8.0	1 3.9	49.40	49.20	.....	329 29 1.68	+ 0.30	+ 3.38	- 36.48	+ 8 23 57.77
		E	...	2 10 53.0	2 41.1	49.90	50.15	.....	30 30 50.32	+ 1.05	- 21.45	+ 36.52	
18	μ Arietis	W	3.5	2 34 23.0	2 51.9	49.40	49.35	.....	340 40 39.70	+ 0.39	+ 35.70	- 21.82	+19 36 22.41
		E	...	2 39 24.0	2 9.1	50.20	50.40	.....	19 18 39.22	+ 1.33	- 20.14	+ 21.83	
19	σ Arietis	E	3	2 43 55.5	2 33.6	50.55	51.00	.....	24 13 36.48	+ 1.80	- 23.60	+ 28.04	+14 41 21.67
		W	...	2 48 22.5	1 53.4	50.50	50.25	.....	335 46 6.75	+ 1.40	+ 12.86	- 28.04	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1905.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
27 3 44	28.3	.....	.....								1	359 59 48.04	+ 3.58
4 1	28.3	29.4	29.792								2	47.10	.....
28 13 25	12.8	14.7	30.058								3	45.96	.....
13 35	12.5	.....	.....								4	46.54	.....
14 7	12.0	.....	.....								5	47.18	-13.02
14 35	11.4	12.9	30.060								6	46.96	.....
14 54	10.9	.....	.....								7	46.18	.....
15 6	10.5	.....	.....								8	47.26	.....
15 20	11.1	.....	.....								9	46.80	+12.29
15 35	11.1	12.6	30.066								10	46.57	-13.06
30 2 34	19.7	22.8	30.182								11	47.22	- 7.33
2 44	19.7	.....	.....								12	47.40	.....
2 53	19.3	.....	.....								13	47.24	.....
3 14	18.9	20.7	30.184								14	47.03	.....
3 32	18.7	.....	.....								15	48.46	+20.00
3 44	18.6	.....	.....								16	45.80	+ 3.65
4 1	17.8	20.7	30.198								17	47.66	.....
4 2 11	22.4	24.9	30.178								18	48.10	+ 4.27
2 33	20.5	.....	.....								19	47.84	.....

Note.
17. Faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	12 Eridani	W	3.5	3 5 18.0	2 58.3	49.15	49.20	.....	291 44 54.95	+ 0.17	+12.66	-2 35.54	-29 21 59.39
		E	...	3 10 18.0	2 1.7	50.05	50.40	.....	68 14 33.12	+ 1.25	- 5.90	+2 35.65	
2	Orionis (mean)	W	3.5	5 17 7.0	2 50.1	50.15	49.95	.....	318 35 50.60	+ 1.07	+18.54	- 55.40	- 2 29 17.33
		E	3	5 22 10.5	2 13.4	50.00	49.85	.....	41 23 37.62	+ 0.94	-11.41	+ 55.42	
3	Orionis	E	3	5 27 20.0	2 31.5	50.35	50.20	.....	29 29 24.78	+ 1.29	-19.52	+ 35.60	+ 9 25 21.66
		W	...	5 32 16.5	2 25.0	51.20	50.70	.....	330 30 8.12	+ 1.99	+17.88	- 35.62	
4	February 6, L. H ¹ . Cephei S. P.	E	3	14 31 4.0	3 14.9	49.15	49.20	.....	299 59 54.78	+ 0.80	- 2.89	-1 46.94	+81 3 0.92
		W	...	14 36 6.0	1 47.1	51.05	50.85	.....	59 59 40.38	+ 2.61	+ 0.87	+1 46.96	
5	2 H. Ursæ Minoris	W	2.5	14 53 41.0	2 36.8	50.65	50.40	.....	27 22 30.45	+ 2.19	- 9.11	+ 32.08	+66 18 23.71
		E	...	14 58 15.0	1 57.2	48.80	48.70	.....	332 37 7.88	+ 0.38	+ 5.09	- 32.08	
6	57 B. Ursæ Minoris	E	2.5	15 5 29.0	2 13.8	49.45	49.00	.....	311 20 33.12	+ 0.87	+ 0.42	-1 10.37	+87 35 40.56
		W	...	15 10 40.0	2 57.2	51.15	50.85	.....	48 38 59.75	+ 2.68	- 0.74	+1 10.39	
7	7 ² Ursæ Minoris	W	2	15 18 25.0	2 40.4	50.65	50.20	.....	33 14 0.55	+ 2.08	- 6.10	+ 40.64	+72 10 5.20
		E	...	15 23 6.0	2 0.6	49.40	49.00	.....	326 45 36.20	+ 0.83	+ 3.45	- 40.64	
8	0 Ursæ Minoris	E	2.5	15 30 26.0	3 58.6	49.40	49.00	.....	321 16 2.05	+ 0.83	+ 8.25	- 49.75	+77 39 43.98
		W	...	15 34 50.0	0 25.4	51.35	51.15	.....	38 43 23.65	+ 2.94	- 0.09	+ 49.76	
9	5 H. Camelop. S. P.	W	3	15 38 38.0	1 57.2	50.90	50.70	.....	69 59 2.90	+ 2.47	+ 2.01	+2 49.15	+71 2 35.64
		E	...	15 43 12.0	2 36.8	49.50	49.20	.....	290 0 32.65	+ 0.99	- 3.60	-2 49.15	
10	87 B. Draconis	E	3	16 3 33.0	2 43.4	49.85	49.90	.....	330 52 5.58	+ 1.51	+ 8.70	- 34.59	+68 3 24.34
		W	...	16 8 20.0	2 3.6	51.25	51.15	.....	29 7 24.30	+ 2.89	- 4.98	+ 34.59	
11	February 7, L. Persei	E	2	2 38 .....	.....	49.75	50.30	26.424	350 4 26.18	+ 1.06	+ 0.38	- 10.73	+48 49 43.22
		W	...	.....	.....	50.80	51.35	26.424	9 52 57.78	+ 2.13	- 0.38	+ 10.73	
12	2 H. Ursæ Minoris S. P.	W	4	2 53 48.0	2 29.8	50.90	51.25	.....	74 42 21.60	+ 1.41	+ 3.97	+3 41.99	+66 18 22.66
		E	...	2 58 28.0	2 10.2	49.90	50.25	.....	285 17 12.02	+ 0.38	- 3.00	-3 42.02	
13	57 B. Ursæ Minoris S. P.	E	2.5	3 5 46.0	1 57.1	49.90	50.30	.....	306 32 9.75	+ 0.39	- 0.30	-1 22.95	+87 35 43.22
		W	...	3 10 42.0	2 58.9	50.95	51.40	.....	53 27 22.18	+ 1.50	+ 0.71	+1 22.97	
14	7 ² Ursæ Minoris S. P.	W	4	3 18 26.0	2 39.4	50.90	51.20	.....	68 51 42.55	+ 1.36	+ 3.54	+2 38.33	+72 10 5.13
		E	...	3 23 26.0	2 20.6	49.80	50.40	.....	291 7 49.85	+ 0.39	- 2.75	-2 38.37	
15	0 Ursæ Minoris S. P.	E	3	3 30 28.0	3 56.7	50.00	50.40	.....	296 36 56.08	+ 0.50	- 5.68	-2 2.52	+77 39 44.86
		W	...	3 34 46.0	0 21.3	50.95	51.40	.....	63 22 41.48	+ 1.50	+ 0.05	+2 2.56	
16	5 H. Camelop.	W	2.5	3 38 26.0	2 9.2	50.95	51.35	.....	32 6 28.92	+ 1.49	- 4.33	+ 38.70	+71 2 33.90
		E	...	3 42 31.0	1 55.8	50.05	50.45	.....	327 53 4.72	+ 0.56	+ 3.48	- 38.70	
17	λ Tauri	E	2	3 52 46.5	2 53.2	50.20	50.55	.....	26 41 49.02	+ 0.68	-27.69	+ 31.03	+12 13 10.74
		W	3	3 57 47.5	2 7.8	51.10	51.40	.....	333 17 55.82	+ 1.57	+15.08	- 31.03	
18	87 B. Draconis S. P.	W	4	4 3 26.0	2 50.5	50.55	50.95	.....	72 57 40.00	+ 1.06	+ 4.82	+3 19.38	+68 3 25.88
		E	...	4 7 6.0	0 49.5	49.90	50.35	.....	287 1 49.55	+ 0.42	- 0.41	-3 19.45	
19	7 Tauri	E	2.5	4 11 42.5	2 55.6	50.00	50.35	.....	23 31 21.48	+ 0.48	-31.60	+ 26.90	+15 23 46.30
		W	...	4 16 39.0	2 0.9	50.65	51.25	.....	336 28 27.42	+ 1.28	+14.98	- 26.90	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1901.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				
3 51	19.7	...	...	11. Instrument in meridian, observation at I with movable thread.	1	359 59 48.18	...
3 52	19.7	21.4	30.180		2	48.69	+15.66
3 53	19.7	...	...		3	47.26	+11.88
3 54	19.7	18.2	30.201		4	48.38	+11.07
3 55	19.7	21.3	29.966		5	48.44	+14.51
3 56	19.7	...	...		6	48.06	...
3 57	19.7	...	...		7	48.10	...
3 58	19.7	...	...		8	48.82	+11.41
3 59	19.7	...	...		9	48.71	...
4 00	19.7	...	...		10	49.00	...
4 01	19.7	...	...		11	47.04	...
4 02	19.7	...	...		12	48.18	+14.55
4 03	19.7	...	...		13	47.12	...
4 04	19.7	...	...		14	47.35	...
4 05	19.7	...	...		15	46.98	+11.47
4 06	19.7	...	...		16	47.42	...
4 07	19.7	...	...		17	47.24	...
4 08	19.7	...	...		18	47.68	...
4 09	19.7	...	...		19	47.02	...

Notes.
10.11. Faint.
11-19. Windy night.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
February 10, L.													
1	ρ Persei	E	2	<i>h m s</i> 2 59	<i>m s</i>	<i>d</i> 50.00	<i>d</i> 51.25	<i>r</i> 26.887	<i>° ' "</i> 0 25 16.30	<i>"</i> + 1.96	<i>"</i> + 0.27	<i>' "</i> + 0.47	<i>° ' "</i> +38 28 22.21
		W	...	.....	.....	49.85	50.65	26.887	359 31 29.50	+ 1.58	- 0.27	- 0.47	
2	57 B. Ursæ Minoris s. P.	W	3	3 5 42.0	2 2.8	49.85	50.65	.....	53 27 24.55	+ 0.85	+ 0.33	+ 20.93	+87 35 43.92
		E	...	3 9 16.0	1 31.2	49.95	50.90	.....	306 32 7.70	+ 1.02	- 0.18	- 20.95	
3	7 ² Ursæ Minoris s. P.	E	4	3 18 40.0	2 25.7	49.80	50.90	.....	291 7 45.22	+ 0.94	- 2.06	- 2 34.40	+72 10 6.20
		W	...	3 23 13.0	2 7.3	50.00	50.90	.....	68 51 45.60	+ 1.04	+ 2.25	+ 2 34.43	
4	149 H ¹ . Cephei	W	2.5	3 30 38.0	5 16.9	50.05	50.80	.....	47 24 35.45	+ 1.04	- 3.69	+ 1 5.39	+86 21 7.44
		E	...	3 34 48.0	1 6.9	50.25	50.90	.....	312 35 0.45	+ 1.18	+ 0.16	- 1 5.39	
5	5 H. Camelop.	E	2	3 38 19.0	2 16.0	50.10	50.80	.....	327 53 2.40	+ 1.05	+ 4.80	- 37.76	+71 2 33.22
		W	...	3 42 6.0	1 31.0	50.10	50.75	.....	32 6 27.20	+ 1.04	- 2.15	+ 37.76	
6	λ Tauri	W	2.5	3 52 44.5	2 55.2	49.75	50.15	.....	333 17 43.78	+ 0.54	+28.33	- 30.29	+12 13 11.56
		E	...	3 57 41.5	2 1.8	50.15	50.90	.....	26 41 34.58	+ 1.13	-13.69	+ 30.30	
7	87 B. Draconis s. P.	E	3.5	4 3 44.0	2 32.6	50.15	50.95	.....	287 1 47.95	+ 1.15	- 3.86	- 3 14.50	+68 3 26.40
		W	...	4 8 46.0	2 29.4	50.25	50.95	.....	72 57 45.40	+ 1.20	+ 3.70	+ 3 14.55	
8	η Ursæ Minoris s. P.	W	3	4 17 28.0	3 0.2	50.10	50.70	.....	65 4 0.80	+ 0.99	+ 3.68	+ 2 9.15	+75 58 16.24
		E	3.5	4 22 16.0	1 47.8	50.05	50.85	.....	294 55 29.62	+ 1.06	- 1.32	- 2 9.18	
9	A Draconis s. P.	E	4	4 26 14.0	2 8.6	50.05	50.80	.....	287 56 23.35	+ 1.04	- 2.65	- 3 4.44	+68 58 14.30
		W	...	4 30 34.0	2 11.4	50.25	50.90	.....	72 3 7.20	+ 1.18	+ 2.76	+ 3 4.47	
10	μ Eridani	W	2.5	4 38 7.0	2 53.0	49.35	50.00	.....	317 39 8.98	+ 0.26	+18.82	- 54.97	- 3 25 57.99
		E	...	4 42 58.5	1 58.5	50.05	50.90	.....	42 20 14.90	+ 1.10	- 8.83	+ 54.98	
11	ζ Aurigæ	E	2	4 56 ....	.....	50.40	51.40	27.186	357 57 13.65	+ 2.24	+ 0.29	- 2.13	+40 56 14.29
		W	...	.....	.....	49.85	50.55	27.186	1 59 6.18	+ 1.53	- 0.29	+ 2.13	
12	λ Aurigæ	W	2	5 12 ....	.....	49.50	50.50	26.582	1 4 12.20	- 0.12	- 0.28	+ 1.15	+40 0 51.51
		E	...	.....	.....	50.30	51.25	26.582	358 53 3.22	+ 0.66	+ 0.28	- 1.15	
13	η Orionis (<i>mean</i>)	E	2	5 17 16.0	2 41.1	50.60	51.55	.....	41 23 43.90	+ 1.69	-16.63	+ 53.33	- 2 29 18.40
		W	...	5 21 44.0	1 46.9	50.50	51.15	.....	318 35 57.00	+ 1.43	+ 7.32	- 53.33	
14	ϕ^1 Orionis	W	2.5	5 27 2.5	2 49.0	49.60	50.25	.....	330 30 0.78	+ 0.51	+24.28	- 34.24	+ 9 25 20.56
		E	...	5 32 23.0	2 31.5	50.50	51.30	.....	29 29 27.05	+ 1.51	-19.52	+ 34.25	
15	ξ Aurigæ	E	3	5 44 13.0	2 56.1	50.80	51.70	.....	343 13 47.30	+ 1.86	+25.72	- 18.26	+55 41 7.47
		W	...	5 49 11.5	2 2.4	50.40	51.05	.....	16 45 31.32	+ 1.34	-12.43	+ 18.25	
February 11, L.													
16	β Persei	E	2	3 2 ....	.....	49.45	50.90	.....	358 18 18.88	+ 1.34	+ 0.29	- 1.77	+40 35 26.33
		W	...	.....	.....	50.70	52.15	.....	1 38 34.25	+ 2.61	- 0.29	+ 1.77	
17	ι H ¹ . Camelop.	W	2	3 9 1.0	2 51.2	50.65	52.00	.....	26 22 38.15	+ 1.78	-11.69	+ 30.23	+65 18 28.07
		E	...	3 14 6.5	2 14.3	49.80	51.10	.....	333 36 57.52	+ 0.89	+ 7.20	- 30.23	
18	σ Tauri	E	2	3 22 37.0	2 50.3	50.00	50.95	.....	27 54 26.20	+ 0.91	-25.78	+ 32.31	+11 0 30.58
		W	...	3 27 31.5	2 4.2	50.85	51.90	.....	332 5 18.50	+ 1.83	+13.73	- 32.32	
19	δ Persei	W	3	3 36 ....	.....	50.65	51.50	28.180	8 31 10.42	+ 0.79	- 0.37	+ 9.20	+47 29 5.31
		E	...	.....	.....	49.80	51.00	28.180	351 23 51.22	+ 0.09	+ 0.37	- 9.20	
20	ϵ Persei	E	2	3 53 ....	.....	50.35	51.30	27.042	3 22 24.05	+ 2.00	+ 0.24	+ 3.63	+35 31 4.99
		W	...	.....	.....	51.25	52.15	27.042	356 34 7.85	+ 2.87	- 0.24	- 3.63	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
10 2 55	33.3	34.6	29.904	1, 11, 16, 20. Instrument in meridian, observation at I with movable thread					1	359 59 47.03	.....
3 8	32.7	.....	.....	12, 19. Instrument in meridian, observation at IX with movable thread.					2	47.12	.....
3 21	32.7 ^u	.....	.....						3	46.06	.....
3 34	32.3	.....	.....						4	47.30	-12.20
3 41	32.3	.....	.....						5	47.17	.....
3 56	31.7	.....	.....						6	47.34	.....
4 6	31.8	33.6	29.938						7	47.80	.....
4 20	31.4	.....	.....						8	47.40	.....
4 29	31.4	.....	.....						9	46.46	.....
4 41	31.2	.....	.....						10	47.62	.....
4 50	30.9	32.4	29.960						11	46.37	.....
5 10	30.3	.....	.....						12	47.89	.....
5 20	30.3	.....	.....						13	47.36	+15.49
5 36	30.0	31.6	29.976						14	47.31	+12.00
5 47	30.0	.....	.....						15	47.55	.....
11 2 56	31.7	33.7	30.222						16	.....	.....
3 11	30.7	.....	.....						17	46.92	- 8.81
3 26	30.2	.....	.....						18	47.69	+ 9.11
3 33	29.7	.....	.....						19	46.43	.....
3 50	29.6	32.5	30.211						20	47.08	.....

Notes.
 a. Faint.
 16. No micrometer record.
 * Thermometer reading increased 10°.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
	February 14, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>p</i> Persei	W	2.5	2 59 . . . .	. . . .	51.10	51.45	27.273	359 31 15.15	- 0.01	- 0.27	- 0.48	+38 28 22.39
		E	. . .	. . . .	. . . .	51.40	51.55	27.273	0 25 1.72	+ 0.20	+ 0.27	+ 0.48	
2	<i>1</i> H ¹ . Camelop.	E	2.5	3 9 0.0	2 52.1	51.00	51.40	. . . .	333 36 53.18	+ 0.65	+11.81	- 30.58	+65 18 28.07
		W	. . .	3 13 50.0	2 3.9	51.00	51.45	. . . .	26 22 33.02	+ 0.66	- 6.12	+ 30.58	
3	<i>σ</i> Persei	W	2.5	3 24 . . . .	. . . .	51.05	51.45	28.147	8 42 14.35	- 0.04	- 0.37	+ 9.50	+47 40 7.15
		E	. . .	. . . .	. . . .	51.45	51.70	28.147	351 12 51.02	+ 0.31	+ 0.37	- 9.50	
4	<i>δ</i> Persei	E	2.5	3 36 . . . .	. . . .	51.25	51.35	26.098	351 25 14.15	+ 1.48	+ 0.37	- 9.30	+47 29 6.27
		W	. . .	. . . .	. . . .	51.05	51.05	26.098	8 32 36.02	+ 1.22	- 0.37	+ 9.30	
5	27 Tauri	W	3	3 41 29.5	2 15.9	50.65	50.85	. . . .	344 50 2.50	+ 0.19	+27.43	- 16.75	+23 45 43.71
		E	. . .	3 46 4.5	2 19.1	51.50	51.15	. . . .	15 9 30.20	+ 0.78	-28.73	+ 16.75	
6	<i>ζ</i> Aurigæ	W	3	4 56 . . . .	. . . .	50.85	51.15	27.320	1 59 2.22	- 0.20	- 0.20	+ 2.18	+40 56 14.75
		E	. . .	. . . .	. . . .	51.35	51.55	27.320	357 57 9.10	+ 0.17	+ 0.29	- 2.18	
7	<i>λ</i> Aurigæ	E	. . .	5 12 . . . .	. . . .	51.20	51.35	27.593	358 52 19.68	+ 1.45	+ 0.28	- 1.18	+40 0 52.30
		W	. . .	. . . .	. . . .	50.85	51.25	27.593	1 3 29.65	+ 1.22	- 0.28	+ 1.18	
8	<i>β</i> Tauri	W	2.5	5 17 54.5	2 37.9	50.55	50.60	. . . .	349 35 25.55	+ 0.01	+51.50	- 11.39	+28 31 34.23
		E	. . .	5 22 25.7	1 53.3	51.60	51.60	. . . .	10 23 44.35	+ 1.06	-20.53	+ 11.38	
9	<i>ε</i> Orionis	E	3	5 28 16.0	2 46.3	51.90	51.85	. . . .	44 52 51.28	+ 1.34	-16.53	+1 1.70	- 5 58 34.47
		W	. . .	5 33 5.0	2 2.7	51.15	51.20	. . . .	315 6 47.88	+ 0.62	+ 9.00	-1 1.72	
10	<i>ξ</i> Aurigæ	W	2.5	5 44 13.0	2 56.0	51.50	51.50	. . . .	16 45 44.50	+ 0.96	-25.69	+ 18.70	+55 41 7.97
		E	. . .	5 49 10.5	2 1.5	52.35	52.05	. . . .	343 14 0.35	+ 1.08	+12.25	- 18.70	
11	57 B. Ursæ Minoris	W	2.5	15 2 34.0	5 13.6	51.80	50.50	. . . .	48 38 59.10	+ 0.41	- 2.33	+1 12.84	+87 35 40.76
		E	. . .	15 6 46.0	1 1.6	52.20	51.30	. . . .	311 20 33.35	+ 1.02	+ 0.09	-1 12.90	
12	<i>1</i> H ¹ . Camelop. s. p.	E	3.5	15 11 34.0	0 18.2	52.20	51.30	. . . .	284 17 38.98	+ 1.01	- 0.06	-4 8.32	+65 18 28.57
		W	. . .	15 15 52.0	3 59.8	52.00	50.60	. . . .	75 41 41.98	+ 0.55	+10.51	+4 8.36	
13	<i>γ</i> Ursæ Minoris	E	. . .	15 19 51.0	1 15.2	52.20	50.70	. . . .	326 45 37.20	+ 0.71	+ 1.34	- 42.09	+72 10 6.27
		W	. . .	15 24 31.0	3 24.8	52.05	50.35	. . . .	33 14 4.00	+ 0.46	- 9.94	+ 42.11	
14	149 H ¹ . Cephei s. p.	W	3	15 30 49.0	5 4.3	52.00	50.35	. . . .	54 41 46.15	+ 0.43	+ 3.06	+1 30.64	+86 21 9.61
		E	. . .	15 35 18.0	0 35.3	52.25	50.80	. . . .	305 17 42.45	+ 0.78	- 0.04	-1 30.64	
15	5 H. Camelop. s. p.	E	3.5	15 39 10.0	1 24.8	52.10	50.50	. . . .	290 0 35.25	+ 0.56	- 1.05	-2 55.21	+71 2 36.30
		W	. . .	15 44 53.0	4 18.2	51.95	50.35	. . . .	69 58 48.48	+ 0.41	+ 9.79	+2 55.21	
16	87 B. Draconis	W	2.5	16 3 33.0	2 44.1	52.20	50.65	. . . .	29 7 25.72	+ 0.69	- 8.77	+ 35.84	+68 3 23.21
		E	. . .	16 8 21.0	2 3.9	52.15	50.65	. . . .	330 52 10.32	+ 0.60	+ 5.00	- 35.86	
17	<i>η</i> Ursæ Minoris	E	3	16 16 14.0	4 14.8	52.45	50.95	. . . .	322 57 25.00	+ 0.97	+11.08	- 48.58	+75 58 14.95
		W	. . .	16 20 48.0	0 19.2	51.85	50.95	. . . .	37 1 56.58	+ 0.20	- 0.06	+ 48.60	
18	<i>Α</i> Draconis	W	3	16 26 10.0	2 13.1	52.00	50.30	. . . .	30 2 10.98	+ 0.41	- 5.39	+ 37.26	+68 58 13.25
		E	. . .	16 30 35.0	2 11.9	52.45	50.80	. . . .	329 57 20.90	+ 0.89	+ 5.29	- 37.26	
19	<i>β</i> Persei	W	2	3 2 . . . .	. . . .	50.60	51.50	27.186	1 38 17.55	- 0.19	- 0.29	+ 1.72	+40 35 25.31
		E	. . .	. . . .	. . . .	50.30	51.35	27.186	358 18 3.12	- 0.46	+ 0.29	- 1.72	
20	<i>ο</i> Tauri	E	2.5	3 17 9.5	2 47.0	50.60	51.60	. . . .	30 13 10.78	+ 0.57	-23.24	+ 34.43	+ 8 41 30.02
		W	. . .	3 21 45.0	1 48.5	51.20	51.95	. . . .	329 46 23.88	+ 1.07	+ 9.81	- 34.44	

Time	Ther- 3862	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>mm.</i>								<i>° ' "</i>	<i>"</i>
24 2 53	26.7	23.2	29.854	1, 3, 6, 19. Instrument in meridian, observation at IX with movable thread.						1	159 59 40.66	
2 53	26.7			4.7. Instrument in meridian, observation at I with movable thread.						2	40.60	- 8.66
3 53	26.7									3	40.64	- 3.41
4 53	26.7									4	40.58	
5 53	26.7									5	40.18	+ 3.19
6 53	26.7									6	45.65	
7 53	26.7									7	47.20	
8 53	26.7									8	47.96	
9 53	26.7									9	46.78	
10 53	26.7									10	47.02	
11 53	26.7									11	45.79	
12 53	26.7									12	46.60	- 8.62
13 53	26.7									13	46.90	
14 53	26.7									14	46.42	-12.27
15 53	26.7									15	46.72	
16 53	26.7									16	46.80	
17 53	26.7									17	46.90	
18 53	26.7									18	46.54	
19 53	26.7									19	44.68	
20 53	26.7									20	45.91	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	10 Tauri	W E	2.5 ...	3 29 15.0 3 34 48.0	3 1.0 2 32.0	50.75 50.40	51.50 51.55	..... .....	321 10 42.48 38 48 40.60	+ 0.61 + 0.45	+22.18 -15.64	- 47.58 + 47.60	+ 0 5 48.87
2	15 Eridani	E W	3 ...	3 40 14.0 3 45 13.0	2 46.1 2 12.9	51.00 50.90	52.45 52.00	..... .....	62 25 29.78 297 34 5.12	+ 1.19 + 0.91	-12.11 + 7.75	+1 52.97 -1 53.00	-23 32 8.99
3	ξ Persei	W E	2.5 ...	3 53 ..... .....	..... .....	50.70 50.75	51.75 51.95	26.927 26.927	356 34 14.60 3 22 30.85	- 0.01 + 0.10	- 0.24 + 0.24	- 3.52 + 3.52	+35 31 4.59
4	174 G. Eridani	E W	3 ...	3 59 12.0 4 4 2.0	2 45.0 2 5.0	51.30 51.05	52.15 51.90	..... .....	66 47 56.82 293 11 36.60	+ 1.19 + 0.95	-11.10 + 6.37	+2 17.53 -2 17.57	-27 55 2.51
5	54 Persei	W E	2.5 ...	4 14 ..... .....	..... .....	50.70 50.85	51.90 52.00	27.267 27.267	355 23 11.25 4 33 6.25	+ 0.05 + 0.17	- 0.23 + 0.23	- 4.76 + 4.76	+34 20 13.98
6	80 Tauri	E W	2.5 3	4 22 8.5 4 27 18.5	2 49.9 2 20.1	51.55 51.30	52.65 52.30	..... .....	23 29 21.90 336 30 15.15	+ 1.59 + 1.27	-29.61 +20.14	+ 25.80 - 25.82	+15 25 42.06
7	i Tauri	W E	2.5 ...	4 42 56.0 4 47 6.0	3 8.0 1 2.0	50.40 51.00	51.35 52.30	..... .....	339 44 45.48 20 14 10.18	+ 0.35 + 1.11	+41.05 - 4.47	- 21.95 + 21.94	+18 40 34.61
8	ε Aurigæ	E W	..... ...	4 55 ..... .....	..... .....	51.35 51.05	52.50 52.30	29.234 29.234	355 11 7.02 4 42 24.08	+ 2.16 + 1.90	+ 0.32 - 0.32	- 4.96 + 4.96	+43 40 59.57
9	λ Eridani	W E	3.5 ...	5 2 8.0 5 7 9.0	2 43.0 2 18.0	50.75 51.20	51.60 52.40	..... .....	312 12 30.42 47 46 54.25	+ 0.66 + 1.29	+15.03 -10.78	-1 5.57 +1 5.58	- 8 52 48.37
10	β Tauri	E W	3 ...	5 18 3.5 5 22 10.2	2 28.9 1 37.8	51.75 51.35	52.85 52.40	..... .....	10 24 2.68 349 35 53.00	+ 1.77 + 1.35	-45.79 +19.77	+ 10.94 - 10.93	+28 31 33.33
11	ε Orionis	W E	3 ...	5 28 1.0 5 32 45.5	3 1.3 1 43.2	50.50 51.05	51.55 52.20	..... .....	315 6 33.42 44 52 45.18	+ 0.50 + 1.12	+19.65 - 6.37	- 59.29 + 59.29	- 5 58 35.94
12	o Aurigæ	E W	2.5 ...	5 37 3.0 5 40 37.5	1 45.0 1 49.5	51.20 50.70	52.50 51.75	..... .....	349 7 49.42 10 51 41.78	+ 1.33 + 0.69	+16.03 -17.44	- 11.44 + 11.44	+49 47 7.09
13	139 Tauri	W E	3 ...	5 49 37.5 5 54 24.5	2 43.9 2 3.1	50.05 50.90	50.95 52.00	..... .....	347 0 24.38 12 58 47.98	- 0.03 + 0.94	+45.61 -25.74	- 13.75 + 13.75	+25 56 26.17
14	74 G. Columbæ	E W	3 ...	6 0 8.0 6 4 27.0	2 33.5 1 45.5	51.20 50.90	52.50 51.80	..... .....	68 37 52.70 291 21 41.95	+ 1.33 + 0.82	- 9.32 + 4.40	+2 31.38 -2 31.41	-29 45 13.63
15	1 H ¹ . Camelop. s. p.	W E	3.5 ...	15 9 13.0 15 14 17.0	2 39.1 2 24.9	51.35 51.05	51.85 51.55	..... .....	75 41 55.05 284 17 32.10	+ 0.90 + 0.60	+ 4.63 - 3.84	+3 57.84 -3 57.97	+65 18 29.72
16	149 H ¹ . Cephei s. p.	E W	3 ...	15 32 6.0 15 37 8.0	3 46.6 1 15.4	50.90 51.55	51.20 52.00	..... .....	305 17 39.18 54 41 52.50	+ 0.34 + 1.08	- 1.70 + 0.19	-1 26.98 +1 27.02	+86 21 8.50
17	ζ Ursæ Minoris	W E	3 ...	15 45 24.0 15 49 54.0	2 15.2 2 14.8	51.85 51.10	52.30 51.40	..... .....	39 8 39.45 320 50 51.25	+ 1.39 + 0.55	- 2.54 + 2.52	+ 50.26 - 50.27	+78 4 58.78
18	151 H ¹ . Cephei s. p.	E W	3 ...	16 2 46.0 16 7 32.0	4 6.2 0 39.8	51.05 51.90	51.30 52.40	..... .....	304 15 5.52 55 44 29.70	+ 0.48 + 1.48	- 2.54 + 0.07	-1 30.57 +1 30.59	+85 18 29.00
19	19 Ursæ Minoris	W E	3 ...	16 11 22.0 16 16 3.0	2 22.3 2 18.7	52.05 51.20	52.55 51.60	..... .....	37 10 31.98 322 48 58.12	+ 1.63 + 0.71	- 3.41 + 3.24	+ 46.88 - 46.89	+76 6 47.47
20	A Draconis	E W	2.5 ...	16 24 25.0 16 29 12.0	3 58.2 0 48.8	50.95 52.25	51.05 52.45	..... .....	329 57 9.28 30 2 6.12	+ 0.30 + 1.67	+17.25 - 0.72	- 35.75 + 35.74	+68 58 12.38

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
17 3 32	37.2	.....	.....	3.5. Instrument in meridian, observation at IX with movable thread.	1	359 59 45.35	.....
3 43	37.0	.....	.....	8. Instrument in meridian, observation at I with movable thread.	2	40.30	.....
4 2	36.7	37.7	29.761		4	40.77	.....
4 18	36.3	.....	.....		5	45.40	+22.15
4 25	36.0	.....	.....		6	46.74	+ 2.21
4 40	35.4	.....	.....		7	45.21	+ 9.12
5 5	35.0	36.2	29.789		8	46.84	.....
5 21	35.0	.....	.....		9	45.78	.....
5 31	34.8	.....	.....		10	45.44	+17.74
5 43	34.7	.....	.....		11	46.40	.....
5 52	34.7	.....	.....		12	46.75	.....
6 3	34.4	35.6	29.792		13	45.90	.....
15 12	22.5	23.9	29.996		14	46.57	+ 7.54
15 35	21.7	.....	.....	Note.	15	45.92	+22.45
15 48	21.3	23.4	30.008	3.14. Wind.	16	41.66	- 8.54
16 5	21.0	.....	.....		17	45.82	-12.35
16 14	20.9	.....	.....		18	46.30	.....
16 27	21.1	.....	.....		19	47.36	.....
					20	46.13	.....
						46.94	.....

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ε Ursæ Minoris	E	3.5	16 53 36.0	2 15.1	50.80	51.40	.....	316 44 30.08	+ 0.40	+ 1.53	- 58.18	+82 11 28.72
	February 18, L.	W	...	16 57 54.0	2 2.9	52.15	52.05	.....	43 14 59.58	+ 1.72	- 1.27	+ 58.20	
2	σ Persei	E	2.5	3 24 .....	.....	51.00	52.40	25.734	351 14 28.00	+ 1.44	+ 0.37	- 9.37	+47 40 6.56
		W	...	.....	.....	51.55	52.85	25.734	8 43 49.58	+ 1.95	- 0.37	+ 9.37	
3	149 H ¹ . Cephei	E	3	3 32 8.0	3 54.4	50.60	52.10	.....	312 34 58.40	+ 0.35	+ 2.02	- 1 6.25	+86 21 7.89
		W	...	3 37 6.0	1 3.6	51.90	53.05	.....	47 24 29.60	+ 1.51	- 0.15	+ 1 6.30	
4	ζ Ursæ Minoris s. p.	W	3	3 45 6.0	2 33.2	51.65	52.85	.....	62 57 25.30	+ 1.27	+ 2.31	+ 1 59.19	+78 5 1.70
		E	...	3 49 38.0	1 58.8	50.80	51.85	.....	297 2 4.80	+ 0.33	- 1.39	- 1 59.23	
5	151 H ¹ . Cephei	E	2.5	4 2 34.0	4 18.0	50.55	51.70	.....	313 37 36.08	+ 0.12	+ 3.10	- 1 4.02	+85 18 27.20
		W	...	4 7 12.0	0 20.0	52.00	53.05	.....	46 21 51.18	+ 1.55	- 0.02	+ 1 4.03	
6	19 Ursæ Minoris s. p.	W	3	4 11 22.0	2 22.3	52.00	53.05	.....	64 55 26.68	+ 1.55	+ 2.28	+ 2 10.07	+76 6 49.45
		E	...	4 16 4.0	2 19.7	50.75	51.75	.....	295 4 4.60	+ 0.25	- 2.20	- 2 10.13	
7	Δ Draconis s. p.	W	3	4 26 10.0	2 13.2	51.85	52.75	.....	72 3 4.65	+ 1.33	+ 2.84	+ 3 7.15	+68 58 13.17
		E	...	4 30 9.0	1 45.8	50.55	51.45	.....	287 56 24.35	0.00	- 1.79	- 3 7.21	
8	ι Tauri	E	2.5	4 43 21.5	2 42.4	50.65	52.05	.....	20 14 34.90	+ 0.36	- 30.63	+ 22.58	+18 40 35.20
		W	...	4 48 7.0	2 3.1	52.20	53.15	.....	339 45 7.82	+ 1.72	+ 17.60	- 22.58	
9	ε Ursæ Minoris s. p.	W	3	4 53 32.0	2 19.2	51.80	52.55	.....	58 51 15.50	+ 1.21	+ 1.31	+ 1 41.08	+82 11 30.13
		E	...	4 58 2.0	2 10.8	50.65	51.75	.....	301 8 14.45	+ 0.20	- 1.15	- 1 41.10	
10	λ Eridani	E	3	5 2 41.0	2 10.0	50.85	51.90	.....	47 46 52.00	+ 0.38	- 9.56	+ 1 7.48	- 8 52 48.62
		W	3.5	5 7 10.0	2 19.0	51.85	52.75	.....	312 12 35.25	+ 1.33	+ 10.93	- 1 7.50	
11	τ Orionis	W	3.5	5 10 31.0	2 43.7	51.45	52.25	.....	314 8 11.32	+ 0.87	+ 15.73	- 1 3.12	- 6 57 4.36
		E	...	5 15 22.0	2 7.3	50.60	51.50	.....	45 51 12.90	+ 0.05	- 9.51	+ 1 3.12	
12	χ Aurigæ	E	3.5	5 27 .....	.....	50.60	51.65	26.757	6 46 20.32	+ 0.86	+ 0.21	+ 7.31	+32 7 16.23
		W	...	.....	.....	51.90	52.75	26.757	353 10 33.55	+ 2.09	- 0.21	- 7.31	
13	ο Aurigæ	W	2.5	5 35 57.5	2 50.5	52.05	52.90	.....	10 52 4.78	+ 1.50	- 42.28	+ 11.78	+49 47 7.30
		E	...	5 40 57.0	2 9.0	50.80	51.80	.....	349 7 41.50	+ 0.30	+ 24.20	- 11.78	
14	139 Tauri	E	3	5 49 44.3	2 37.1	51.00	52.05	.....	12 59 3.92	+ 0.54	- 41.91	+ 14.16	+25 56 25.82
		W	...	5 54 16.5	1 55.1	52.10	53.05	.....	347 0 45.32	+ 1.02	+ 22.51	- 14.15	
15	74 G. Columbæ	W	3.5	6 0 20.0	2 21.4	51.60	52.40	.....	291 21 42.30	+ 1.01	+ 7.91	- 2 35.93	-29 45 13.30
	February 23, L.	E	4	6 4 46.0	2 4.6	51.00	51.75	.....	68 37 44.68	+ 0.38	- 6.14	+ 2 36.00	
16	13 H ¹ . Camelop. s. p.	W	4	15 34 18.0	2 58.4	50.30	51.25	.....	74 6 31.72	+ 0.25	+ 5.50	+ 3 28.10	+66 54 24.26
		E	...	15 39 38.0	2 21.6	51.35	52.70	.....	285 52 57.22	+ 1.52	- 3.47	- 3 28.13	
17	ζ Ursæ Minoris	E	2	15 45 38.0	2 2.0	51.50	52.70	.....	320 50 48.88	+ 1.60	+ 2.07	- 48.84	+78 4 59.00
		W	...	15 50 30.0	2 50.0	50.85	51.70	.....	39 8 43.08	+ 0.76	- 4.01	+ 48.85	
18	151 H ¹ . Cephei s. p.	W	2.5	16 2 22.0	4 28.6	50.80	51.65	.....	55 44 29.15	+ 0.72	+ 3.03	+ 1 28.00	+85 18 29.22
		E	...	16 6 44.0	0 6.6	51.40	52.35	.....	304 14 59.00	+ 1.37	0.00	- 1 28.00	
19	19 Ursæ Minoris	E	2	16 10 47.0	2 57.9	51.30	52.35	.....	322 48 53.95	+ 1.32	+ 5.33	- 45.53	+76 6 47.82
		W	...	16 15 17.0	1 32.1	50.95	51.70	.....	37 10 32.75	+ 0.82	- 1.43	+ 45.53	
20	γ Ursæ Minoris	W	2	16 19 13.0	1 16.7	50.75	51.65	.....	37 2 0.08	+ 0.67	- 1.00	+ 45.31	+75 58 14.73
		E	...	16 23 14.0	2 44.3	51.10	52.20	.....	322 57 28.20	+ 1.14	+ 4.01	- 45.31	

Time.	Ther. 386.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905 O.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
17 16 05	20.7	23.6	16.222	2, 12. Instrument in meridian, observation at I with movable thread	1	359 59 40.01	.....
18 1 21	20.7	23.1	16.191		2	45.76	3.35
1 15	20.7	.....	.....		3	45.89	12.36
1 45	20.0	.....	.....		4	46.29	.....
4 5	20.2	.....	.....		5	46.06	.....
1 14	28.7	.....	.....		6	46.55	.....
4 13	28.1	10.1	10.198		7	45.66	.....
4 46	28.4	.....	.....		8	45.88	.....
4 56	28.1	.....	.....		9	45.75	.....
5 5	28.0	.....	.....		10	45.16	17.76
5 11	27.4	20.4	10.204		11	45.68	.....
5 12	27.2	.....	.....		12	45.76	.....
5 52	27.8	.....	.....		13	45.00	.....
6 1	27.1	28.7	10.224	Note.	14	46.00	7.48
21 15 17	12.7	14.1	20.366	3, 5, 18. Paint.	15	15.10	22.54
16 5	12.1	.....	.....		16	46.16	8.23
16 14	12.4	.....	.....		17	46.20	.....
16 22	12.1	.....	.....		18	46.64	.....
					19	46.17	.....
					20	46.85	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	70 B. Ursæ Minoris	E W	3 ...	16 32 22.0 16 37 23.0	2 34.1 2 26.9	51.10 50.90	52.20 51.85	.....	321 17 48.80 38 41 40.40	+ 1.13 + 0.85	+ 3.45 - 3.14	- 48.10 + 48.10	+77 37 56.98
2	ε Ursæ Minoris	W E	2.5 ...	16 53 29.0 16 58 34.0	2 23.2 2 41.8	50.50 50.90	51.75 52.20	.....	43 15 2.78 316 44 28.08	+ 0.60 + 1.05	- 1.73 + 2.20	+ 56.47 - 56.47	+82 11 28.15
3	ζ Draconis	E W	2.5 ...	17 5 58.0 17 10 48.0	2 46.2 2 3.8	51.00 50.70	52.35 51.85	.....	333 5 40.58 26 53 46.22	+ 1.15 + 0.75	+10.61 - 5.89	- 30.46 + 30.46	+65 49 41.35
4	February 24, L. ζ Ursæ Minoris s. P.	E W	3 ...	3 45 6.0 3 49 24.0	2 34.1 1 43.9	50.00 50.15	50.60 50.60	.....	297 1 59.38 62 57 32.95	+ 1.09 + 1.17	- 2.33 + 1.06	- 1 54.97 + 1 55.00	+78 5 0.42
5	151 H ¹ . Cephei	W E	3 ...	4 4 14.0 4 7 34.0	2 36.6 0 43.4	50.20 49.80	50.65 50.15	.....	46 21 56.20 313 37 36.15	+ 1.22 + 0.76	- 1.17 + 0.09	+ 1 1.82 - 1 1.83	+85 18 27.97
6	19 Ursæ Minoris s. P.	E W	2.5 ...	4 10 51.0 4 14 16.0	2 54.1 0 30.9	49.75 50.35	50.10 50.90	.....	295 3 59.80 64 55 33.48	+ 0.71 + 1.42	- 3.40 + 0.11	- 2 5.53 + 2 5.57	+76 6 48.98
7	7 Ursæ Minoris s. P.	E W	3 ...	4 18 24.0 4 22 30.0	2 5.8 2 0.2	49.70 50.40	50.20 50.85	.....	294 55 25.70 65 4 4 58	+ 0.74 + 1.42	- 1.79 + 1.64	- 2 6.41 + 2 6.44	+75 58 15.56
8	70 B. Ursæ Minoris s. P.	W E	2.5 ...	4 32 44.0 4 37 13.0	2 12.3 2 16.7	50.40 49.70	50.90 50.05	.....	63 24 31.80 296 34 59.52	+ 1.46 + 0.67	+ 1.78 - 1.90	+ 1 57.52 - 1 57.53	+77 37 57.58
9	π ³ Orionis	E W	2 ...	4 42 2.5 4 47 10.5	2 53.5 2 14.5	49.70 50.50	50.05 51.00	.....	32 7 16.30 327 52 23.92	+ 0.66 + 1.56	-23.85 +14.34	+ 37.08 - 37.08	+ 6 47 32.80
10	ε Ursæ Minoris s. P.	E W	2.5 ...	4 53 24.0 4 58 27.0	2 28.4 2 34.6	49.75 50.65	49.95 51.20	.....	301 8 9.30 58 51 19.75	+ 0.63 + 1.73	- 1.49 + 1.61	- 1 37.52 + 1 37.54	+82 11 28.62
11	ζ Draconis s. P.	W E	3 ...	5 6 28.0 5 11 4.0	2 16.3 2 19.7	50.60 49.50	51.10 49.90	.....	75 11 2.38 284 48 28.35	+ 1.66 + 0.49	+ 3.34 - 3.51	+ 3 40.20 - 3 40.26	+65 49 42.22
12	β Leporis	E W	3 ...	5 21 46.0 5 25 27.0	2 39.7 1 1.3	49.50 50.50	49.85 51.30	.....	59 44 0.82 300 15 41.48	+ 0.45 + 1.70	-11.71 + 1.73	+ 1 41.13 - 1 41.14	-20 50 26.94
13	ζ Tauri	W E	3 ...	5 29 27.7 5 34 26.3	2 45.7 2 12.9	50.00 49.55	50.65 49.90	.....	342 9 10.55 17 50 7.30	+ 1.11 + 0.51	+35.48 -22.83	- 19.06 + 19.06	+21 4 58.54
14	δ Aurigæ	E W	3 ...	5 49 9.5 5 54 10.5	2 48.7 2 12.3	49.85 50.55	50.20 51.40	.....	344 38 10.62 15 21 9.90	+ 0.81 + 1.78	+26.62 -16.38	- 16.28 + 16.28	+54 16 41.42
15	7 Geminorum	W E	3 ...	6 6 31.0 6 11 31.5	2 53.1 2 7.4	49.85 49.25	50.35 49.70	.....	343 36 3.02 16 23 11.95	+ 0.88 + 0.25	+41.60 -22.54	- 17.45 + 17.45	+22 31 56.99
16	λ Canis Majoris	E W	3.5 ...	6 22 10.0 6 27 11.0	2 44.4 2 16.6	49.65 50.75	49.95 51.05	.....	71 23 52.28 288 35 40.15	+ 0.58 + 1.70	-10.20 + 7.04	+ 2 54.74 - 2 54.79	-32 31 35.13
17	ψ ¹⁵ Aurigæ	W E	2 ...	6 40 .... .....	..... .....	50.10 49.30	50.55 49.50	26.976 26.976	4 43 17.78 355 13 24.78	+ 0.38 - 0.55	- 0.32 + 0.32	+ 4.94 - 4.94	+43 40 18.10
18	θ Geminorum	E W	2 ...	6 46 .... .....	..... .....	49.40 50.55	49.50 50.95	27.867 27.867	4 48 24.62 355 6 58.92	+ 0.97 + 2.29	+ 0.22 - 0.22	+ 5.04 - 5.04	+34 4 29.07
19	22 Canis Majoris	W E	4 ...	6 55 48.0 7 0 22.0	2 23.9 2 10.1	49.85 49.00	50.20 49.35	.....	293 18 20.45 66 41 8.98	+ 0.81 - 0.06	+ 8.46 - 6.92	- 2 16.98 + 2 16.98	-27 48 16.60
20	18 Lyncis	E W	3 ...	7 5 33.0 7 10 21.0	2 20.9 2 27.1	49.50 50.55	49.95 51.05	.....	339 6 47.65 20 52 44.48	+ 0.51 + 1.61	+11.88 -12.95	- 22.65 + 22.65	+59 48 25.72

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
23 16 36	32.3	33.6	29.868	17. Instrument in meridian, observation at IX with movable thread.							1	359 59 45.74	+12.74
16 45	32.3	...	...	18. Instrument in meridian, observation at I with movable thread.							2	40 49	...
16 56	32.3	...	...								3	46.71	...
17 9	32.4	33.1	29.868								4	46.22	...
24 3 48	40.6	42.0	29.830								5	46.62	...
4 6	40.0	...	...								6	46.08	...
4 21	39.5	...	...								7	46.16	...
4 36	39.3	...	...								8	46.66	+12.75
4 44	39.3	41.4	29.826								9	46.46	...
4 56	39.1	...	...								10	45.78	...
5 10	38.7	...	...								11	46.32	...
5 25	38.2	...	...								12	47.23	+21.50
5 32	38.1	40.9	29.820								13	46.06	...
5 52	37.5	...	...								14	46.68	...
6 9	37.2	...	...								15	47.58	...
6 25	36.7	39.2	29.810								16	45.75	+23.31
6 38	36.4	...	...								17	47.20	...
6 58	36.8	...	...								18	45.78	...
7 6	36.7	38.4	29.800								19	45.86	+21.63
											20	46.59	- 0.08

Note.
4, 5. Faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	February 26, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Persei	W	2	3 52		49.05	50.10	27.008	0 47 11.22	0.00	+ 0.28	+ 0.83	+39 44 8.90
		E				48.65	49.85	27.008	359 9 27.90	- 0.34	- 0.28	- 0.83	
2	μ Persei	E	2	4 8		48.85	49.80	25.910	350 44 20.18	+ 1.19	+ 0.37	- 9.53	+48 10 8.60
		W				49.75	50.05	25.910	9 13 45.12	+ 2.09	- 0.37	+ 9.53	
3	δ Tauri	W	2.5	4 17 17.5	2 56.9	48.90	40.50		338 46 49.02	+ 0.34	+34.95	- 22.75	+17 42 31.43
		E		4 22 15.5	2 1.1	49.00	49.90		21 12 24.78	+ 0.59	-16.38	+ 22.75	
4	γ B. Ursæ Minoris s. p.	E	3	4 32 26.0	2 30.5	49.25	50.05		206 35 0.22	+ 0.80	- 2.30	-1 56.76	+77 37 58.28
		W		4 37 10.0	2 19.5	50.20	51.05		63 24 31.75	+ 1.79	+ 1.98	+1 56.83	
5	θ Camelop.	W	2.5	4 42 15.0	2 36.8	50.15	50.95		27 15 9.48	+ 1.72	- 9.20	+ 30.25	+66 11 1.36
		E		4 46 13.0	1 21.2	49.25	49.90		332 44 29.65	+ 0.72	+ 2.47	- 30.26	
6	ζ H ¹ . Camelop.	E	3	4 50 46.0	2 10.9	49.20	50.15		324 59 53.42	+ 0.83	+ 3.51	- 41.14	+73 55 47.10
		W		4 55 35.0	2 38.1	50.60	51.30		34 59 39.62	+ 2.14	- 5.12	+ 41.15	
7	ζ Draconis s. p.	E	4	5 6 14.0	2 30.5	49.35	50.00		284 48 27.98	+ 0.82	- 4.07	-3 39.07	+65 49 42.59
		W		5 11 4.0	2 19.5	50.70	51.35		75 11 2.65	+ 2.21	+ 3.50	+3 39.08	
8	β Leporis	W	3.5	5 21 29.0	2 56.7	50.00	50.55		300 15 29.80	+ 1.44	+14.33	-1 40.49	-20 50 25.99
		E		5 26 12.0	1 46.3	49.40	49.80		59 43 54.05	+ 0.76	- 5.19	+1 40.48	
9	ζ Tauri	E	3	5 29 35.5	2 37.8	49.85	50.60		17 50 16.80	+ 1.38	-32.18	+ 18.93	+21 4 57.70
		W		5 34 22.5	2 9.2	50.80	51.40		342 9 22.35	+ 2.29	+21.58	- 18.93	
10	δ Aurigæ	W	2.5	5 49 12.5	2 45.6	49.90	50.75		15 21 19.30	+ 1.49	-25.65	+ 16.15	+54 16 41.52
		E		5 54 10.0	2 11.9	49.35	50.25		344 38 20.22	+ 0.94	+16.27	- 16.15	
11	γ Geminorum	E	3	6 6 42.5	2 41.6	49.95	50.70		16 23 24.58	+ 1.50	-36.26	+ 17.31	+22 31 56.24
		W		6 11 20.5	2 2.4	50.00	51.05		343 36 21.08	+ 2.00	+20.81	- 17.31	
12	λ Canis Majoris	W	3.5	6 22 18.0	2 36.4	49.85	50.40		288 35 37.32	+ 1.29	+ 9.23	-2 53.35	-32 31 34.94
		E		6 27 19.0	2 24.6	49.50	50.20		71 23 50.90	+ 1.01	- 7.89	+2 53.39	
13	ϕ Aurigæ	E	2.5	6 40		49.85	50.45	27.326	355 13 8.88	+ 2.04	+ 0.32	- 4.90	+43 40 17.31
		W				50.55	51.15	27.326	4 43 0.58	+ 2.76	- 0.32	+ 4.90	
14	γ B. Ursæ Minoris	W	2.5	6 32 6.0	2 50.5	51.00	50.65		38 41 40.20	+ 2.23	- 4.22	+ 48.85	+77 37 56.40
		E		6 36 38.0	1 41.5	49.90	49.10		321 17 53.78	+ 0.88	+ 1.50	- 48.88	
15	θ Camelop. s. p.	E	4	6 42 6.0	2 45.8	49.85	49.15		285 9 52.75	+ 0.88	- 4.88	-3 42.05	+66 11 3.25
		W		6 46 18.0	1 26.2	51.50	50.85		74 49 41.15	+ 2.59	+ 1.32	+3 42.12	
16	ζ Draconis	W	2.5	6 6 5.0	2 30.5	50.55	49.70		26 53 49.88	+ 1.52	- 9.77	+ 31.02	+65 49 41.07
		E		6 10 37.0	1 52.5	49.40	48.65		333 5 49.30	+ 0.40	+ 4.86	- 31.03	
17	ϵ Persei	W	4	4 2		49.20	49.60	27.350	8 30 15.35	- 0.22	- 0.06	+ 8.80	+47 27 35.42
		E				49.30	50.10	27.350	351 25 54.80	- 0.33	+ 0.37	- 8.79	
18	δ Persei	E	2	4 14		49.60	50.50	27.064	4 33 13.65	+ 1.47	+ 0.22	+ 4.70	+34 20 13.49
		W				50.00	50.60	27.064	355 23 17.18	+ 1.74	- 0.22	- 4.70	
19	μ Persei	W	3	4 27		49.35	50.15	27.509	3 54 21.18	- 0.30	- 0.31	+ 4.04	+42 51 41.41
		E				49.45	50.25	27.509	356 1 38.72	- 0.19	+ 0.31	- 4.04	
20	μ Eridani	E	3.5	4 38 2.0	2 58.1	50.00	50.90		42 20 26.58	+ 1.15	-19.95	+ 53.44	- 3 25 59.05
		W		4 42 41.0	1 40.9	50.10	50.90		317 39 15.95	+ 1.21	+ 6.40	- 53.46	

Time	Ther. 1905	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point	Red. to 1905 o.
<i>h m s</i>	<i>"</i>	<i>"</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
25 1 10	41.1	44.7	29.644	1 19	Instrument in meridian, observation at IX with movable thread				1	359 59 46.70
25 1 40	40.5			2 11, 18	Instrument in meridian, observation at I with movable thread				2	46 70
25 2 10	40.0			17	Instrument in meridian; W observation at VII; E observation at IX with movable thread.				3	46 65
25 2 40	39.1	45.7	29.640						4	47.16
25 3 10	38.5								5	47.12
25 3 40	37.9								6	47.20
25 4 10	37.5								7	46 35
25 4 40	37.0								8	46 59
25 5 10	36.5	45.1	29.641						9	46 11
25 5 40	36.0								10	46 28
25 6 10	35.5								11	46 86
25 6 40	35.0								12	46 95
25 7 10	34.5	43.1	29.644						13	46 41
25 7 40	34.0								14	46 12
25 8 10	33.5								15	46 94
25 8 40	33.0								16	46 09
25 9 10	32.5	42.4	29.642						17	46 24
25 9 40	32.0								18	46 62
25 10 10	31.5								19	46 46
25 10 40	31.0	41.1	29.643						20	46 60

Notes.
17 Cloudy
19 Faint.

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Aurigæ	W	3	4 51 . . . .	. . . .	49.55	50.05	26.600	354 4 21.10	-0.24	-0.22	-6.08	+33 0 54.65
		E	...	. . . .	. . . .	49.50	50.25	26.600	5 52 52.15	-0.17	+0.22	+6.08	
2	η Aurigæ	E	3	5 0 . . . .	. . . .	49.65	50.30	26.974	357 47 14.65	+1.40	+0.29	-2.24	+41 6 21.91
		W	...	. . . .	. . . .	50.00	50.95	26.974	2 9 21.05	+1.91	-0.29	+2.24	
3	τ Orionis	E	3.5	5 10 24.0	2 50.8	49.80	50.50	.....	45 51 23.22	+0.86	-17.12	+1 0.55	-6 57 5.21
		W	...	5 15 15.0	2 0.2	50.00	50.45	.....	314 8 15.22	+0.93	+8.48	-1 0.56	
4	χ Aurigæ	W	3	5 27 . . . .	. . . .	49.30	49.90	27.173	353 10 18.78	-0.44	-0.21	-7.01	+32 7 15.45
		E	...	. . . .	. . . .	49.35	50.10	27.173	6 46 6.32	-0.31	+0.21	+7.01	
5	ξ^2 Canis Majoris	E	3	6 28 34.0	2 46.2	51.30	51.70	.....	61 47 6.22	+2.23	-12.25	+1 49.38	-22 53 42.94
		W	...	6 33 28.0	2 7.8	51.25	51.55	.....	298 12 26.70	+2.12	+7.24	-1 49.38	
6	κ Canis Majoris	W	4	6 43 52.0	2 41.3	50.30	51.05	.....	288 42 52.40	+1.38	+9.84	-2 52.21	-32 24 18.01
		E	3	6 48 38.0	2 4.7	50.30	51.10	.....	71 16 32.72	+1.41	-5.88	+2 52.20	
7	22 Canis Majoris	E	3	6 55 30.0	2 41.9	50.75	51.50	.....	66 41 13.22	+1.84	-10.71	+2 15.94	-27 48 17.41
		W	...	7 0 26.0	2 14.1	50.80	51.35	.....	293 18 19.28	+1.80	+7.35	-2 15.97	
8	18 Lyncis	W	2.5	7 5 19.0	2 34.9	50.15	50.85	.....	20 52 46.58	+1.20	-14.36	+22.49	+59 48 26.47
		E	...	7 10 15.0	2 21.1	50.05	50.55	.....	339 6 45.58	+1.00	+11.92	-22.50	
9	ϵ Geminorum	E	2	7 17 20.7	2 44.8	50.20	50.95	.....	10 56 36.02	+1.28	-53.60	+11.42	+27 59 6.91
	March 2, L.	W	...	7 22 13.5	2 8.0	51.15	51.75	.....	349 3 12.82	+2.17	+32.36	-11.43	
10	c Persei	E	2	4 2 . . . .	. . . .	51.20	51.05	27.444	351 25 48.15	+1.94	+0.37	-9.00	+47 27 35.21
		W	...	. . . .	. . . .	50.75	50.70	27.444	8 30 8.70	+1.52	-0.37	+9.00	
11	δ Tauri	W	2.5	4 14 42.5	2 59.7	50.05	49.80	.....	338 23 22.18	-0.02	+35.52	-23.80	+17 19 4.09
		E	...	4 19 31.5	1 49.3	50.90	50.95	.....	21 35 46.95	+1.00	-13.14	+23.81	
12	9 Camelop.	E	2.5	4 41 2.0	3 49.7	51.50	51.55	.....	332 44 11.55	+1.61	+19.73	-31.01	+66 11 1.44
		W	...	4 45 26.0	0 34.3	51.05	51.00	.....	27 15 0.08	+1.10	-0.44	+31.00	
13	57 H ¹ . Camelop.	W	2.5	4 50 40.0	2 16.7	50.80	50.70	.....	34 59 38.18	+0.82	-3.83	+42.18	+73 55 46.97
		E	...	4 55 16.0	2 19.3	51.15	51.20	.....	324 59 53.40	+1.25	+3.97	-42.20	
14	μ Leporis	E	3	5 6 13.0	2 41.9	51.40	51.40	.....	55 13 10.85	+1.48	-12.99	+1 26.70	-16 19 22.95
		W	...	5 11 6.0	2 11.1	51.15	50.95	.....	304 46 24.20	+1.13	+8.52	-1 26.72	
15	f Draconis s. p.	W	3	5 28 24.0	4 10.4	50.80	50.60	.....	72 49 32.50	+0.77	+10.34	+3 13.28	+68 11 32.79
		E	...	5 33 6.0	0 31.6	50.75	50.60	.....	287 9 48.22	+0.74	-0.16	-3 13.32	
16	ω Draconis s. p.	E	3	5 36 22.0	1 22.2	50.65	50.55	.....	287 46 4.88	+0.67	-1.09	-3 6.46	+68 47 56.45
		W	...	5 39 54.0	1 9.8	50.95	50.85	.....	72 13 23.90	+0.98	+0.78	+3 6.43	
17	η Leporis	W	3.5	5 49 30.0	2 50.1	50.40	50.30	.....	306 54 12.00	+0.41	+14.88	-1 20.28	-14 11 23.83
		E	...	5 54 29.0	2 8.9	50.95	50.95	.....	53 5 14.90	+1.03	-8.54	+1 20.30	
18	40 Draconis s. p.	E	3	6 5 3.0	2 18.2	50.70	50.70	.....	298 56 3.10	+0.77	-1.61	-1 48.99	+79 59 10.41
		W	...	6 10 6.0	2 44.8	51.05	51.00	.....	61 3 27.02	+1.10	+2.29	+1 49.03	
19	ξ^2 Canis Majoris	W	3.5	6 28 30.0	2 50.1	50.30	50.15	.....	298 12 27.62	+0.29	+12.83	-1 52.42	-22 53 42.00
		E	...	6 33 38.0	2 17.9	50.90	50.85	.....	61 47 0.40	+0.95	-8.44	+1 52.43	
20	κ Canis Majoris	E	3.5	6 43 43.0	2 50.3	51.30	51.25	.....	71 16 31.35	+1.36	-10.97	+2 56.98	-32 24 16.61
		W	...	6 48 40.0	2 6.7	50.95	50.90	.....	288 43 2.40	+1.00	+6.07	-2 57.00	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
28 5 3	39.6	.....	29.716	1.4. Instrument in meridian, observation at IX with movable thread.	1	359 59 47.07	.....
5 25	39.6	40.9	29.729	2.10. Instrument in meridian, observation at I with movable thread.	2	45.42	.....
6 31	39.3	40.3	.....		3	45.79	.....
6 46	39.2	.....	.....		4	46.22	.....
6 58	39.2	.....	.....		5	46.13	.....
7 8	38.9	.....	.....		6	45.93	+23.35
7 21	37.8	40.3	29.736		7	46.38	+22.26
2 3 59	32.0	33.1	29.786		8	45.96	-0.65
4 17	30.7	.....	.....		9	45.52	.....
4 44	29.7	.....	.....		10	45.26	.....
4 53	29.3	30.7	29.777		11	46.30	.....
5 9	28.6	.....	.....		12	46.81	.....
5 32	28.4	.....	.....		13	46.88	-8.52
5 43	28.6	.....	.....		14	46.58	+20.47
5 52	28.4	29.6	29.782	Note. 10. Faint.	15	46.18	+11.99
6 8	27.7	.....	.....		16	45.04	.....
6 31	27.3	28.7	29.778		17	47.35	+20.13
6 47	27.3	.....	.....		18	46.36	+10.41
					19	46.83	.....
					20	45.60	+23.56

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Geminorum	W	3	6 55 50.0	2 54.2	50.20	49.95	.....	341 46 37.68	+ 0.13	+38.52	- 19.94	+20 42 25.99
		E	...	7 0 45.8	2 1.6	51.15	51.05	.....	18 12 35.08	+ 1.18	-18.78	+ 19.94	
2	29 Canis Majoris	E	3	7 12 1.0	2 57.9	51.70	51.60	.....	63 16 40.52	+ 1.74	-13.69	+1 59.88	-24 23 25.85
		W	...	7 17 6.0	2 7.1	51.15	51.05	.....	296 42 55.45	+ 1.18	+ 6.99	-1 59.88	
3	9 Camelop. s. p.	W	4	16 41 22.0	3 20.8	50.70	50.05	.....	74 49 35.48	+ 0.28	+ 7.81	+3 42.80	+66 11 2.89
		E	...	16 46 18.0	1 26.2	51.25	50.50	.....	285 9 48.52	+ 0.79	- 1.32	-3 42.83	
4	σ Ophiuchi	W	2.5	17 18 33.0	3 29.9	50.85	50.15	.....	325 17 58.12	+ 0.41	+32.76	- 42.39	+ 4 13 19.30
		E	...	17 23 42.5	1 30.6	51.50	50.80	.....	34 41 7.25	+ 1.07	- 7.37	+ 42.37	
5	f Draconis	E	3.5	17 28 37.0	3 57.5	51.50	50.80	.....	330 43 47.02	+ 1.07	+18.18	- 34.31	+68 11 31.52
	March 6, L.	W	...	17 33 30.0	1 1.5	51.30	50.35	.....	29 15 28.15	+ 0.75	- 1.22	+ 34.30	
6	μ Persei	W	2.5	4 8 .....	.....	48.35	48.80	25.930	9 13 47.85	- 0.44	- 0.37	+ 9.68	+48 10 9.15
		E	...	.....	.....	50.45	51.05	25.930	350 44 18.95	+ 1.80	+ 0.37	- 9.68	
7	δ Tauri	E	3.5	4 14 55.0	2 47.2	51.10	52.00	.....	21 36 3.22	+ 3.33	-30.75	+ 23.57	+17 19 4.33
		W	...	4 20 13.5	2 31.6	48.85	49.35	.....	338 23 32.48	+ 0.82	+25.29	- 23.59	
8	π ³ Orionis	W	3	4 41 57.0	2 59.0	48.20	49.00	.....	327 52 15.88	+ 0.31	+25.39	- 37.49	+ 6 47 32.86
		E	...	4 47 1.5	2 5.5	48.75	49.70	.....	32 7 5.40	+ 0.96	-12.48	+ 37.51	
9	ε Aurigæ	W	3	4 55 .....	.....	49.30	50.45	26.513	4 44 19.12	+ 0.90	- 0.32	+ 4.98	+43 40 59.43
		E	...	.....	.....	49.00	49.85	26.513	355 13 3.08	+ 0.43	+ 0.32	- 4.98	
10	μ Leporis	W	2.5	5 6 4.0	2 50.9	49.50	50.00	.....	304 16 19.10	+ 1.51	+14.48	-1 26.04	-16 19 22.47
		E	...	5 11 3.0	2 8.1	49.45	50.10	.....	55 13 7.52	+ 1.53	- 8.13	+1 26.08	
11	f Draconis s. p.	E	3	5 28 15.0	4 19.8	49.15	49.85	.....	287 9 59.88	+ 1.23	-11.13	-3 11.95	+68 11 33.87
		W	...	5 32 18.0	0 16.8	50.70	51.55	.....	72 49 42.25	+ 2.90	+ 0.05	+3 12.06	
12	ω Draconis s. p.	W	3	5 35 56.0	1 48.5	50.85	51.50	.....	72 13 24.82	+ 2.95	+ 1.90	+3 5.35	+68 47 55.68
		E	...	5 39 46.0	2 1.5	49.40	50.20	.....	287 46 5.70	+ 1.54	- 2.38	-3 5.46	
13	γ Leporis	E	3.5	5 49 31.0	2 49.1	49.90	50.70	.....	53 5 20.90	+ 2.06	-14.71	+1 19.96	-14 11 23.37
		W	...	5 54 30.0	2 9.9	50.80	51.15	.....	306 54 17.02	+ 2.74	+ 8.68	-1 19.98	
14	40 Draconis s. p.	W	3	6 4 20.0	3 1.8	50.65	51.20	.....	61 3 26.72	+ 2.60	+ 2.79	+1 48.53	+79 59 10.51
		E	...	6 8 32.0	1 10.2	49.45	50.00	.....	298 56 2.30	+ 1.47	- 0.42	-1 48.57	
15	α Canis Majoris	W	3	6 39 3.0	2 10.3	50.40	50.70	.....	304 30 22.52	+ 2.33	+ 8.38	-1 27.62	-16 35 26.16
		E	...	6 43 24.0	2 10.7	49.00	49.60	.....	55 29 10.70	+ 1.04	- 8.43	+1 27.64	
16	51 Geminorum	E	3	7 5 48.5	2 22.3	50.35	50.45	.....	22 35 55.05	+ 2.16	-21.45	+ 25.17	+16 19 2.91
		W	3.5	7 10 6.0	1 55.2	51.05	52.00	.....	337 23 41.22	+ 3.62	+14.06	- 25.17	
17	108 G. Puppis	W	3	7 27 30.0	2 45.1	49.65	50.05	.....	299 0 21.00	+ 1.61	+12.25	-1 48.77	-22 5 45.15
		E	...	7 32 27.0	2 11.9	49.20	49.35	.....	60 59 7.40	+ 1.02	- 7.82	+1 48.80	
18	φ Geminorum	W	2.5	7 46 32.5	1 24.6	49.45	49.85	.....	348 5 4.65	+ 1.40	+13.12	- 12.78	+27 0 34.83
	March 10, L.	E	...	7 50 53.7	2 56.6	49.45	49.55	.....	11 55 12.68	+ 1.25	-57.08	+ 12.80	
19	51 Aurigæ	W	2.5	6 32 .....	.....	49.55	51.05	27.506	31 9 3.32	- 0.12	- 0.28	+ 0.56	+39 28 26.81
		E	...	.....	.....	49.60	51.20	27.506	359 24 49.20	- 0.03	+ 0.28	- 0.56	
20	57 Aurigæ	E	2.5	6 44 .....	.....	49.00	51.25	26.488	357 0 24.25	+ 1.63	+ 0.30	- 3.04	+41 53 33.68
		W	...	.....	.....	49.90	51.20	26.488	2 56 53.15	+ 1.50	- 0.30	+ 3.04	

Time	Ther. 1882	Att. ther	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.
<i>h m s</i>	<i>"</i>	<i>"</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
1 5 58	26.7	...	...	6, 9, 12 Instrument in meridian, observation at IX with movable thread.	1	159 59 46.90	...
7 11 26	26.7	22.2	29.778	Instrument in meridian, observation at I with movable thread.	2	46 10	+21.42
16 49	21.4	22.6	29.789		3	45 76	...
17 0	21.4	...	...		4	46 11	...
17 21	21.6	...	...		5	46 97	+12.04
17 14	21.6	22.2	29.708		6	47 37	- 1.95
6 4 5	42.8	44.4	30.214		7	47 18	...
4 18	41.7	...	...		8	47 74	...
4 45	40.1	...	...		9	48 86	...
4 54	39.6	...	...		10	48 02	+20.49
5 9	38.8	40.9	30.221		11	47 64	+12.18
5 11	38.1	...	...		12	47 21	...
5 52	37.0	...	...		13	48 14	+20.22
6 7	36.7	...	...		14	47 56	+10.68
6 19	36.9	37.7	30.212	Notes.	15	48 28	...
6 42	37.4	37.1	30.211	6. Very faint, poor observation.	16	47 34	...
7 11	37.0	36.4	30.210	10.16 Clouds.	17	47 74	+20.55
7 19	34.4	...	...		18	48 02	...
7 51	34.1	34.7	30.245		19	46 82	...
16 6 29	41.1	41.8	29.773		20	46 19	...
6 41	42.9	...	...		

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>ε</i> Canis Majoris	W	4	6 49 21.0	2 48.7	49.25	50.90	.....	304 9 29.90	+ 0.37	+13.96	-1 25.96	-16 56 11.17
		E	...	6 54 24.0	2 14.3	49.80	51.20	.....	55 49 55.70	+ 0.81	- 8.85	+1 25.98	
2	<i>δ</i> Canis Majoris	E	4	7 2 5.0	2 42.5	50.10	51.50	.....	65 7 59.25	+ 1.11	-11.07	+2 5.69	-26 14 53.07
		W	...	7 6 51.0	2 3.5	49.90	51.30	.....	294 51 34.25	+ 0.91	+ 6.40	-2 5.74	
3	29 Canis Majoris	W	3.5	7 12 16.0	2 42.8	49.15	50.50	.....	296 42 46.58	+ 0.12	+11.46	-1 55.89	-24 23 27.17
		E	...	7 17 11.0	2 12.2	49.70	51.40	.....	63 16 40.40	+ 0.87	- 7.56	+1 55.92	
4	108 G. Puppis	E	4	7 27 20.0	2 46.0	50.50	51.65	.....	60 59 14.68	+ 1.40	-12.39	+1 45.42	-22 5 46.83
		W	...	7 32 33.0	2 18.0	49.90	51.15	.....	299 0 18.50	+ 0.83	+ 8.56	-1 45.45	
5	<i>ι</i> Puppis	W	4	7 37 27.0	2 48.7	49.45	50.65	.....	292 22 39.75	+ 0.36	+11.45	-2 21.61	-28 43 59.51
		E	...	7 42 28.0	2 12.3	49.90	51.35	.....	67 36 46.45	+ 0.94	- 7.04	+2 21.64	
6	<i>ι</i> Cancri	E	3	7 49 48.5	2 3.3	50.40	51.75	.....	22 52 24.42	+ 1.41	-15.95	+ 24.79	+16 2 28.11
		W	...	7 53 32.5	1 40.7	50.30	51.35	.....	337 7 10.88	+ 1.15	+10.64	- 24.79	
7	<i>μ</i> Cancri	W	2.5	7 59 28.5	2 58.0	49.30	50.70	.....	342 55 24.58	+ 0.30	+42.52	- 18.04	+21 51 10.07
		E	...	8 4 31.0	2 4.5	49.75	51.20	.....	17 3 46.25	+ 0.78	-20.81	+ 18.03	
8	114 B. Draconis	W	3.5	16 41 9.0	2 35.7	49.70	49.85	.....	18 1 20.32	+ 0.22	-18.13	+ 19.62	+56 56 52.27
		E	...	16 46 10.5	2 25.8	50.00	50.10	.....	341 58 13.75	+ 0.49	+15.90	- 19.63	
9	57 H ¹ . Camelop. s. p.	E	3.5	16 51 6.0	1 50.1	50.40	50.55	.....	292 53 14.52	+ 0.94	- 1.55	-2 22.01	+73 55 48.93
		W	...	16 54 48.0	1 51.9	50.50	50.70	.....	67 6 16.30	+ 1.07	+ 1.60	+2 22.04	
10	<i>ω</i> Herculis	W	3	17 17 ....	.....	49.85	50.00	25.664	353 39 17.85	- 0.36	- 0.22	- 6.70	+32 35 13.22
		E	...	.....	.....	50.25	50.35	25.664	6 19 10.20	+ 0.03	+ 0.22	+ 6.70	
11	<i>f</i> Draconis	E	3.5	17 28 35.0	4 0.0	50.60	50.65	.....	330 43 46.92	+ 1.09	+18.57	- 33.83	+68 11 30.59
		W	...	17 32 36.0	0 1.0	50.70	50.90	.....	29 15 25.80	+ 1.27	0.00	+ 33.83	
12	<i>ω</i> Draconis	W	3.5	17 36 40.0	1 4.8	50.65	50.55	.....	29 51 49.30	+ 1.07	- 1.29	+ 34.69	+68 47 54.43
	March 11, L.	E	...	17 41 31.0	3 46.2	50.50	50.55	.....	330 7 25.88	+ 0.99	+15.76	- 34.70	
13	<i>α</i> Aurigæ	W	3	5 10 ....	.....	48.70	50.00	26.695	6 57 15.55	- 0.49	- 0.35	+ 7.23	+45 54 6.53
		E	...	.....	.....	49.80	51.10	26.695	352 59 48.15	+ 0.64	+ 0.35	- 7.23	
14	<i>δ</i> Orionis	E	3	5 24 33.0	2 51.4	50.50	51.50	.....	39 16 56.38	+ 1.93	-19.68	+ 48.35	- 0 22 23.87
		W	...	5 29 13.0	1 48.6	49.90	51.15	.....	320 42 45.22	+ 1.46	+ 7.90	- 48.35	
15	<i>β</i> Aurigæ	W	2.5	5 53 ....	.....	49.05	50.30	.....	5 59 18.80	- 0.15	- 0.34	+ 6.24	+44 56 18.10
		E	...	.....	.....	49.75	50.85	.....	353 57 26.78	+ 0.49	+ 0.34	- 6.24	
16	36 Camelop.	E	3	6 0 54.0	2 39.6	50.10	51.40	.....	333 11 0.12	+ 1.68	+ 9.84	- 29.92	+65 44 21.27
		W	...	6 5 32.0	1 58.4	49.70	50.80	.....	26 48 25.55	+ 1.18	- 5.42	+ 29.93	
17	<i>γ</i> Geminorum	W	2.5	6 29 34.0	2 55.1	48.45	49.40	.....	337 33 2.72	- 0.19	+32.67	- 24.52	+16 28 40.81
	March 12, L.	E	...	6 34 48.5	2 19.4	49.50	50.70	.....	22 26 17.25	+ 1.02	-20.72	+ 24.52	
18	<i>α</i> Tauri	W	2.5	4 28 32.0	2 11.1	48.65	50.00	.....	337 23 34.48	+ 0.33	+18.21	- 24.55	+16 18 57.79
		E	...	4 32 35.5	1 52.4	50.05	51.15	.....	22 35 53.10	+ 1.04	-13.39	+ 24.55	
19	<i>ε</i> Aurigæ	E	2.5	4 51 ....	.....	50.55	51.70	27.294	5 52 20.92	+ 2.90	+ 0.22	+ 6.10	+33 0 54.29
		W	...	.....	.....	49.50	50.30	27.294	354 3 50.38	+ 1.05	- 0.22	- 6.10	
20	<i>η</i> Aurigæ	W	2	5 0 ....	.....	49.10	50.10	27.374	2 9 7.95	- 0.12	- 0.29	+ 2.25	+41 6 21.96
		E	...	.....	.....	50.80	51.85	27.374	357 46 59.20	+ 1.65	+ 0.29	- 2.25	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
10 6 52	42.6	...	...	10, 13, 15, 20. Instrument in meridian, observation at IX with movable thread.				1	350 59 45.96	+ 20.00
7 5	42.1	...	...	19. Instrument in meridian, observation at I with movable thread.				2	45.40	
7 15	41.9	...	...					3	45.95	+ 22.10
7 30	41.3	...	...					4	45.78	+ 21.17
7 40	41.2	42.6	29.750					5	45.97	+ 22.30
7 55	40.9	...	...					6	46.28	
8 1	40.9	42.6	29.754					7	46.80	+ 9.90
16 39	32.0	33.3	29.964					8	46.27	
16 58	31.8	...	...					9	46.46	- 8.40
17 15	31.7	...	...					10	46.29	
17 27	31.6	...	...					11	46.82	+ 12.53
17 45	31.3	32.0	29.987					12	46.85	
11 4 47	46.3	46.3	30.106					13	46.44	
5 7	44.0	...	...	Notes.				14	46.00	
5 27	43.3	...	...	13, 14. Clouds.				15	...	
5 50	42.8	44.5	30.100	15. No micrometer record.				16	46.48	+ 8.10
6 4	42.6	...	...	16. Very faint.				17	46.38	
6 32	41.5	...	...					18	47.18	
12 6 50	...	43.1	30.109					19	46.92	
4 31	43.6	45.3	30.000					20	46.59	
4 48	41.6	...	...					

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Orionis	E	2.5	5 7 29.0	2 44.4	51.20	52.35	.....	47 13 9.80	+ 2.84	-15.46	+1 3.83	- 8 18 57.33
		W	...	5 12 12.5	1 59.1	49.75	50.45	.....	312 46 27.95	+ 1.13	+ 8.11	-1 3.86	
2	α Leporis	W	2.5	5 25 58.0	2 49.6	48.45	49.45	.....	303 12 3.78	- 0.06	+13.88	-1 30.23	-17 53 43.56
		E	...	5 30 28.0	1 40.4	50.50	51.85	.....	56 47 19.90	+ 2.22	- 4.86	+1 30.25	
3	α Columbæ	E	3.5	5 33 55.0	2 32.7	50.85	52.15	.....	72 59 50.35	+ 2.56	- 8.56	+3 11.51	-34 7 51.87
		W	4	5 38 42.0	2 14.3	49.50	50.60	.....	286 59 42.92	+ 1.07	+ 6.62	-3 11.52	
4	θ Aurigæ	W	3	5 53 .....	.....	48.75	49.80	27.344	358 15 12.95	- 0.45	- 0.25	- 1.77	+37 12 20.35
		E	...	.....	.....	50.30	51.65	27.344	1 40 59.48	+ 1.29	+ 0.25	+ 1.78	
5	36 Camelop.	W	2.5	6 0 38.0	2 55.6	48.90	49.00	.....	26 48 33.52	+ 0.41	-11.92	+ 29.96	+65 44 21.63
		E	...	6 5 28.0	1 54.4	50.50	51.70	.....	333 11 4.48	+ 2.14	+ 5.06	- 29.96	
6	51 Aurigæ	E	3	6 32 .....	.....	52.30	53.20	26.956	359 25 7.28	+ 4.56	+ 0.28	- 0.58	+39 28 26.91
		W	...	.....	.....	50.30	51.15	26.956	0 31 29.55	+ 2.50	- 0.28	+ 0.58	
7	ψ Aurigæ	W	3	6 44 .....	.....	49.70	50.40	27.207	2 56 26.75	+ 0.35	- 0.30	+ 3.09	+41 53 34.21
		E	...	.....	.....	51.50	52.45	.....	357 1 30.38	+ 2.32	+ 0.30	- 3.09	
8	ϵ Canis Majoris	E	3	6 49 31.0	2 38.8	52.00	53.00	.....	55 49 54.92	+ 3.59	-12.37	+1 27.42	-16 56 10.51
		W	...	6 54 24.0	2 14.2	50.10	51.25	.....	304 9 36.40	+ 1.72	+ 8.83	-1 27.44	
9	51 Geminorum	W	3	7 5 26.5	2 44.3	48.50	49.40	.....	337 23 29.85	- 0.05	+28.60	- 24.77	+16 19 2.59
		E	...	7 10 20.5	2 9.7	50.70	51.65	.....	22 35 52.28	+ 2.23	-17.82	+ 24.77	
10	δ Geminorum	W	3.5	7 17 31.7	2 33.9	48.75	49.50	.....	349 3 2.52	+ 0.13	+46.76	- 11.52	+27 59 7.13
		E	...	7 21 37.0	1 31.4	50.60	51.50	.....	10 55 59.55	+ 2.10	-16.50	+ 11.51	
11	κ Geminorum	E	3	7 36 25.7	2 33.1	51.25	52.10	.....	14 17 56.05	+ 2.75	-36.60	+ 15.20	+24 37 25.45
		W	...	7 41 16.5	2 17.7	49.70	50.65	.....	345 41 39.65	+ 1.21	+29.61	- 15.20	
12	ι Cancri	W	3	7 49 13.0	2 38.9	48.50	49.35	.....	337 6 57.85	- 0.08	+26.49	- 25.16	+16 2 28.31
		E	...	7 54 3.0	2 11.1	50.55	51.60	.....	22 52 26.25	+ 2.12	-18.03	+ 25.16	
13	μ Cancri	E	3	7 59 38.5	2 48.0	51.20	52.05	.....	17 4 0.72	+ 2.69	-37.88	+ 18.32	+21 51 19.66
		W	...	8 4 24.5	1 58.0	49.45	50.40	.....	342 55 48.82	+ 0.95	+18.69	- 18.31	
14	57 H ¹ . Camelop. s. p.	W	3.5	16 50 26.0	2 30.1	50.60	50.65	.....	67 6 13.50	+ 1.17	+ 2.88	+2 23.00	+73 55 49.60
		E	4	16 56 36.0	3 39.9	50.15	50.00	.....	292 53 21.38	+ 0.62	- 6.17	-2 23.06	
15	w Herculis	E	3.5	17 17 .....	.....	50.25	50.35	28.446	6 17 15.52	+ 1.57	+ 0.22	+ 6.76	+32 35 12.59
		W	...	.....	.....	51.15	51.30	28.446	353 37 20.68	+ 2.52	- 0.22	- 6.76	
16	f Draconis	W	3.5	17 28 12.0	4 23.3	50.55	50.50	.....	29 15 48.50	+ 1.08	-22.34	+ 34.10	+68 11 30.45
		E	...	17 32 28.0	0 7.3	50.00	49.85	.....	330 44 7.08	+ 0.46	+ 0.02	- 34.10	
17	ω Draconis	E	3.5	17 36 9.0	1 36.1	50.05	50.15	.....	330 7 40.98	+ 0.64	+ 2.85	- 34.97	+68 47 53.97
		W	...	17 43 17.0	5 31.9	50.80	50.55	.....	29 52 22.10	+ 1.23	-33.92	+ 35.00	
18	γ Draconis	W	3.5	17 52 11.0	2 27.8	50.35	50.15	.....	12 34 29.08	+ 0.79	-26.51	+ 13.60	+51 29 47.08
		E	...	17 56 29.5	1 50.7	49.60	49.35	.....	347 25 14.55	0.00	+14.87	- 13.00	
19	β Orionis	W	3	5 7 26.0	2 47.3	50.00	50.80	.....	312 46 20.22	+ 0.64	+16.01	-1 4.31	- 8 18 57.39
	Murch 13. L.	E	...	5 11 28.0	1 14.7	49.40	50.30	.....	47 12 59.15	+ 0.08	- 3.19	+1 4.33	
20	α Leporis	E	3.5	5 26 4.0	2 43.5	50.45	51.05	.....	56 47 27.38	+ 1.00	-12.90	+1 30.95	-17 53 43.79
		W	...	5 30 30.0	1 48.5	51.30	51.95	.....	303 12 9.25	+ 1.90	+ 5.68	-1 30.99	

Time.	Ther. 39°2.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>			<i>in.</i>							
22 5 10	42.0		30.00	4.7. Instrument in meridian, observation at IX with movable thread.				1	359 59 47.17	.....
5 28	41.1	41.7	30.00	6.16. Instrument in meridian, observation at I with movable thread.				2	47.44	.....
5 35	41.1							3	47.48	.....
5 51	41.1							4	47.67	.....
6 3	40.6							5	46.84	5.41
6 10	40.0	42.0	32.923					6	47.12	.....
6 53	37.2	.....	.....					7	47.62	1 2.48
7 7	35.2	.....	.....					8	46.54	+21.07
7 20	38.7	41.0	30.043					9	47.54	.....
7 31	38.1	.....	.....					10	47.28	.....
8 2	38.2	40.8	30.042					11	46.14	.....
10 11	51.1	12.5	30.144	1.6 Clouds.				12	47.10	.....
11 15	50.1	.....	.....	11.17. Very faint.				13	47.00	+ 9.84
12 27	50.1	.....	.....	11.18. One microscope reading decreased to .				14	46.96	- 8.27
12 46	49.8	.....	.....	15. Unsteady.				15	46.18	.....
12 55	49.7	10.7	30.144					16	47.40	+12.53
1 1 12	49.1	41.0	30.064					17	46.96	.....
1 28	49.3	.....	.....					18	46.19	.....
								19	46.46	.....
								20	46.14	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Columbæ	W E	4 ...	5 34 9.0 5 38 37.0	2 18.6 2 9.4	50.70 49.90	51.65 50.75	..... .....	286 59 44.10 72 59 47.82	+ 1.44 + 0.57	+ 7.05 - 6.15	-3 13.11 +3 13.21	-34 7 51.47
2	θ Aurigæ	E W	3 ...	5 53 ..... .....	..... .....	50.55 51.45	51.05 51.95	26.957 26.957	1 41 13.60 358 15 23.15	+ 1.78 + 2.70	+ 0.25 - 0.25	+ 1.79 - 1.79	+37 12 19.71
3	α H. Camelop.	W E	2.5 ...	6 5 34.5 6 10 6.0	3 4.3 1 27.2	50.60 50.05	51.15 50.75	..... .....	30 25 24.42 329 34 15.52	+ 1.12 + 0.65	-10.03 + 2.25	+ 35.15 - 35.16	+69 21 20.21
4	ζ Canis Majoris	E W	3 ...	6 14 11.0 6 19 3.0	2 44.3 2 7.7	50.15 51.10	50.80 51.90	..... .....	68 54 16.58 291 5 17.38	+ 0.72 + 1.77	-10.63 + 6.42	+2 34.15 -2 34.16	-30 1 38.19
5	γ Geminorum	E W	3 ...	6 29 37.0 6 34 19.5	2 52.0 1 50.5	50.05 51.00	50.65 51.65	..... .....	22 26 27.62 337 33 20.40	+ 0.59 + 1.59	-31.53 +13.02	+ 24.76 - 24.76	+16 28 40.91
6	θ Geminorum	W E	3 ...	6 46 ..... .....	..... .....	50.35 49.90	51.15 50.45	25.824 25.824	355 8 26.48 4 49 49.38	+ 0.26 - 0.31	- 0.22 + 0.22	- 5.09 + 5.09	+34 4 30.03
7	α Canis Majoris	E W	3.5 ...	6 56 29.0 7 1 20.0	2 50.1 2 0.9	50.55 51.20	51.00 51.55	..... .....	62 35 20.75 297 24 16.55	+ 1.03 + 1.65	-12.66 + 6.40	+1 55.33 -1 55.35	-23 42 1.09
8	λ Geminorum	W E	3 ...	7 10 2.5 7 14 54.5	2 51.3 2 0.7	50.35 50.10	50.50 50.30	..... .....	337 46 54.12 22 12 21.05	+ 0.67 + 0.44	+31.54 -15.66	- 24.54 + 24.54	+16 42 32.22
9	η Canis Majoris	E W	3.5 ...	7 18 17.0 7 22 35.0	2 19.1 1 58.9	50.40 51.00	50.75 51.40	..... .....	68 0 7.82 291 59 23.82	+ 0.82 + 1.46	- 7.73 + 5.05	+2 27.83 -2 27.86	-29 7 26.33
10	f Puppis	W E	3.5 ...	7 31 27.0 7 37 41.0	2 40.2 3 33.8	50.40 50.55	50.75 50.85	..... .....	286 22 3.65 73 37 34.52	+ 0.83 + 0.95	+ 9.32 -16.60	-3 22.17 +3 22.22	-34 45 38.22
11	ϕ Geminorum	E W	2.5 ...	7 45 20.5 7 49 46.0	2 37.5 1 49.0	50.80 51.30	51.00 51.55	..... .....	11 54 58.50 348 4 53.88	+ 1.16 + 1.69	-44.85 +21.77	+ 12.70 - 12.70	+27 0 35.04
12	March 15, L. δ Orionis	W E	3 ...	5 24 31.0 5 29 20.5	2 53.3 1 56.2	49.30 50.45	49.60 50.75	..... .....	320 42 35.42 39 16 47.08	- 0.22 + 0.96	+20.12 - 9.05	- 48.73 + 48.76	- 0 22 24.07
13	β Aurigæ	E W	3 ...	5 53 ..... .....	..... .....	51.30 50.90	51.85 51.60	26.997 26.997	353 57 22.42 5 59 12.12	+ 2.60 + 2.36	+ 0.34 - 0.34	- 6.30 + 6.30	+44 56 17.15
14	α H. Camelop.	E W	3.5 ...	6 5 26.0 6 10 19.0	3 12.7 1 40.3	51.40 51.15	51.45 51.45	..... .....	329 34 6.12 30 25 16.88	+ 1.82 + 1.68	+10.97 - 2.97	- 35.14 + 35.16	+69 21 20.00
15	ζ Canis Majoris	W E	4 ...	6 14 8.0 6 18 43.0	2 47.3 1 47.7	50.85 51.45	51.10 51.55	..... .....	291 5 13.75 68 54 9.40	+ 1.35 + 1.87	+11.02 - 4.57	-2 34.14 +2 34.13	-30 1 37.91
16	March 16, L. α Aurigæ	E W	2.5 ...	5 10 ..... .....	..... .....	50.50 50.95	51.30 51.65	27.478 27.478	352 59 13.38 6 56 39.45	+ 2.33 + 2.74	+ 0.35 - 0.35	- 7.01 + 7.01	+45 54 6.41
17	δ Ursæ Minoris S. P.	W E	3 ...	6 1 2.0 6 6 5.0	2 4.7 2 58.3	50.90 49.30	51.45 49.85	..... .....	54 26 26.52 305 33 4.80	+ 1.88 + 0.26	+ 0.48 - 0.98	+1 20.35 -1 20.39	+86 36 40.72
18	β Canis Majoris	E W	3 ...	6 15 57.0 6 21 2.0	2 49.3 2 15.7	50.10 51.55	50.65 52.35	..... .....	56 48 37.12 303 10 55.18	+ 1.06 + 2.68	-13.82 + 8.88	+1 27.88 -1 27.90	-17 54 50.19
19	α Canis Majoris	W E	3 ...	6 56 33.0 7 1 34.0	2 46.1 2 14.9	50.20 49.30	51.05 50.30	..... .....	297 24 6.25 62 35 21.38	+ 1.35 + 0.48	+12.08 - 7.96	-1 50.90 +1 50.91	-23 42 1.51
20	λ Geminorum	E W	2.5 ...	7 10 6.5 7 14 42.0	2 47.2 1 48.3	49.85 51.15	50.60 52.05	..... .....	22 12 35.98 337 47 10.80	+ 0.90 + 2.32	-30.05 +12.61	+ 23.59 - 23.58	+16 42 32.37

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>ins.</i>			<i>° ' "</i>	<i>"</i>
13 5 37	37.7	.....	.....	2, 13, 16. Instrument in meridian, observation at I with movable thread.	1	359 59 47.46	.....
5 51	37.2	.....	.....	6. Instrument in meridian, observation at IX with movable thread.	2	45.84	.....
6 4	36.8	39.6	30.062		3	46.96	.....
6 22	36.6	.....	.....		4	46.12	.....
6 32	36.4	.....	.....		5	45.84	.....
6 44	36.0	.....	.....		6	46.80	.....
6 59	35.5	37.4	30.067		7	46.85	+22.67
7 13	35.3	.....	.....		8	46.08	.....
7 21	35.0	.....	.....		9	45.90	+23.35
7 34	34.8	.....	.....		10	46.36	+23.90
7 48	34.7	36.8	30.066		11	46.08	.....
15 7 6	43.2	44.7	30.248		12	47.17	.....
5 28	41.5	.....	.....		13	46.66	.....
5 50	40.6	.....	.....		14	47.26	.....
6 8	39.6	41.8	30.251		15	46.40	.....
6 16	39.6	.....	.....		16	45.45	.....
16 5 7	58.1	59.4	30.048		17	46.46	.....
6 4	55.1	56.3	30.036		18	45.54	.....
6 19	54.6	.....	.....		19	46.80	+22.85
6 59	53.6	55.2	30.032		20	46.28	.....
7 13	53.6	.....	.....		

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	7 Canis Majoris	W	3.5	7 18 11.0	2 25.1	50.90	51.75	.....	291 59 15.88	+ 2.04	+ 8.42	-2 22.03	-29 7 26.00
		E	...	7 22 55.0	2 18.9	49.90	50.75	.....	68 0 13.98	+ 1.00	- 7.71	+2 22.06	
2	f Puppis	E	4	7 31 39.0	2 28.1	50.40	51.10	.....	73 37 35.22	+ 1.46	- 7.97	+3 14.22	-34 45 39.51
		W	...	7 36 58.0	2 50.9	51.30	52.00	.....	286 21 52.18	+ 2.38	+10.61	-3 14.28	
3	26 Lynceis	W	3	7 48 ....	.....	50.90	51.55	25.771	8 52 22.68	+ 1.20	- 0.37	+ 9.05	+47 48 39.17
		E	...	.....	.....	49.95	50.50	25.771	351 5 55.72	+ 0.20	+ 0.37	- 9.05	
4	ρ Argūs	E	4	8 1 4.0	2 41.9	50.70	51.20	.....	62 55 28.88	+ 1.67	-11.40	+1 52.88	-24 2 9.29
		W	...	8 6 7.0	2 21.1	51.65	52.15	.....	297 4 2.02	+ 2.65	+ 8.66	-1 52.90	
5	58 Camelop.	W	2.5	8 10 7.0	2 55.1	51.35	51.80	.....	19 6 50.85	+ 2.30	-21.02	+ 20.09	+58 2 22.62
		E	...	8 15 6.5	2 4.4	49.90	50.45	.....	340 52 48.62	+ 0.86	+10.61	- 20.09	
6	29 Cancrī	E	3	8 20 45.0	2 50.3	50.35	50.85	.....	24 23 43.00	+ 1.31	-28.83	+ 26.29	+14 31 20.75
		W	...	8 25 43.0	2 7.7	51.55	52.05	.....	335 35 57.78	+ 2.55	+16.22	- 26.29	
7	19 G. Pyxidis	W	4	8 32 21.0	2 53.6	50.85	51.75	.....	298 45 21.58	+ 2.02	+13.49	-1 45.26	-22 20 37.89
		E	...	8 37 21.0	2 6.4	49.75	50.60	.....	61 14 1.62	+ 0.88	- 7.15	+1 45.27	
8	March 18, L. δ Ursæ Minoris S. P.	E	3	6 1 6.0	2 1.4	49.65	51.35	.....	305 32 58.22	+ 0.58	- 0.45	-1 17.75	+86 36 40.50
		W	...	6 6 38.0	3 30.6	50.50	52.70	.....	54 26 25.72	+ 1.69	+ 1.37	+1 17.80	
9	β Canis Majoris	W	3	6 16 18.0	2 28.3	49.65	51.55	.....	303 10 50.98	+ 0.68	+10.61	-1 25.09	-17 54 50.13
		E	...	6 21 2.0	2 15.7	49.20	51.00	.....	56 48 34.05	+ 0.16	- 8.88	+1 25.13	
10	March 23, L. α Canis Majoris	E	3	6 38 27.0	2 46.0	51.80	51.50	.....	55 29 11.25	+ 2.40	-13.60	+1 25.45	-16 35 26.46
		W	...	6 43 24.0	2 11.0	50.60	50.35	.....	304 30 15.35	+ 1.19	+ 8.47	-1 25.47	
11	ζ Geminorum	E	2	6 56 4.0	2 40.0	51.50	51.30	.....	18 12 43.60	+ 2.14	-32.50	+ 19.40	+20 42 27.00
		W	3	7 1 3.0	2 19.0	50.45	50.00	.....	341 46 47.52	+ 0.95	+24.54	- 19.41	
12	δ Geminorum	W	2.5	7 12 6.5	2 36.1	49.70	49.20	.....	343 13 30.75	+ 0.14	+33.19	- 17.78	+22 9 18.98
		E	...	7 17 4.0	2 21.4	51.60	51.15	.....	16 45 48.70	+ 2.12	-27.23	+ 17.79	
13	α Geminorum (2d star)	E	3	7 29 ....	.....	51.65	51.10	27.567	6 47 13.70	+ 2.85	+ 0.21	+ 7.06	+32 5 45.42
		W	...	.....	.....	50.60	50.25	27.567	353 8 27.00	+ 1.88	- 0.21	- 7.06	
14	κ Geminorum	W	2.5	7 36 3.0	2 55.5	50.00	49.50	.....	345 41 20.42	+ 0.45	+48.10	- 15.06	+24 37 26.70
		E	...	7 40 42.5	1 44.0	51.45	51.05	.....	14 17 33.42	+ 1.99	-16.90	+ 15.05	
15	26 Lynceis	E	2	7 48 ....	.....	51.55	51.00	28.003	351 4 18.48	+ 2.75	+ 0.37	- 9.23	+47 48 39.96
		W	...	.....	.....	50.45	50.00	28.003	8 50 48.72	+ 1.68	- 0.37	+ 9.23	
16	March 25, L. ε Canis Majoris	E	3.5	6 52 24.0	2 44.9	49.50	50.30	.....	67 43 47.75	+ 0.55	-10.92	+2 16.06	-28 50 56.28
		W	...	6 57 16.0	2 7.1	49.70	50.40	.....	292 15 38.52	+ 0.71	+ 6.49	-2 16.09	
17	δ Canis Majoris	W	3.5	7 1 59.0	2 48.2	49.05	50.00	.....	294 51 21.18	+ 0.17	+11.86	-2 1.26	-26 14 54.24
		E	...	7 6 46.0	1 58.8	49.15	50.10	.....	65 7 57.82	+ 0.27	- 5.92	+2 1.30	
18	δ Geminorum	E	3	7 12 10.5	2 32.0	49.75	50.75	.....	16 45 54.90	+ 0.90	-31.46	+ 17.04	+22 9 18.88
		W	...	7 16 48.2	2 5.7	50.10	50.90	.....	343 13 40.45	+ 1.10	+21.53	- 17.05	
19	α Geminorum (2d star)	W	...	7 29 ....	.....	49.25	50.00	26.482	353 9 13.72	- 0.46	- 0.21	- 6.78	+32 5 46.00
		E	...	.....	.....	49.20	50.20	26.482	6 48 0.72	- 0.39	+ 0.21	+ 6.78	

Time.	Ther. 3892	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>	<i>1</i>	<i>19</i>	<i>11</i>	<i>15</i>	<i>15</i>	<i>1</i>	<i>159 59 40.82</i>	<i>+23.63</i>
16 2 21	51.5	51.1	30.036	Instrument in meridian, observation at IX with movable thread.					2	40.91	+24.25
2 32	51.1	50.8		Instrument in meridian, observation at I with movable thread.					3	40.60	.....
2 46	51.0	50.9							4	40.23	.....
3 4	51.0	50.8							5	40.11	- 0.56
3 11	51.1	50.9							6	40.09	+11.86
3 21	51.2	51.0							7	40.22	+20.12
3 31	51.2	51.0							8	43.50	.....
3 41	51.6	51.1	30.015						9	43.82	.....
3 51	51.6	51.1	30.015						10	42.52	.....
4 1	51.1	50.8	30.015						11	43.12	.....
4 11	51.1	50.8	30.015						12	43.84	.....
4 21	51.1	50.8	30.015						13	43.84	.....
4 31	51.1	50.8	30.015						14	43.74	.....
4 41	51.1	50.8	30.015						15	43.76	.....
4 51	51.1	50.8	30.015						16	41.54	.....
5 1	51.1	50.8	30.015						17	42.71	.....
5 11	51.1	50.8	30.015						18	41.74	.....
5 21	51.1	50.8	30.015						19	42.62	.....

Notes.

Paint.

4 E. One microscope reading increased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 Puppis	E W	3.5 ...	7 37 46.0 7 42 27.0	2 29.4 2 11.6	50.00 50.55	51.00 51.40	..... .....	67 36 52.85 292 22 32.45	+ 1.16 + 1.64	- 8.98 + 6.97	+2 16.67 -2 16.68	-28 44 2.14
2	3 Cancri	W E	2.5 ...	7 52 51.5 7 57 51.0	2 45.0 2 14.5	49.45 49.40	50.15 50.40	..... .....	338 38 17.42 21 20 57.22	+ 0.43 + 0.55	+30.24 -20.10	- 22.17 + 22.17	+17 33 59.56
3	58 Camelop.	E W	2.5 2	8 10 11.0 8 15 8.0	2 50.9 2 6.1	50.15 50.90	50.75 51.40	..... .....	340 52 34.35 19 6 40.12	+ 1.10 + 1.82	+20.03 -10.91	- 19.67 + 19.67	+58 2 23.96
4	29 Cancri	W E	2.5 ...	8 20 46.0 8 26 4.5	2 49.1 2 29.4	50.00 49.60	50.50 50.30	..... .....	335 35 44.62 24 23 34.92	+ 0.91 + 0.60	+28.44 -22.20	- 25.74 + 25.74	+14 31 21.10
5	19 G. Pyxidis	E W	3 ...	8 32 36.0 8 37 31.0	2 38.4 2 16.6	50.05 51.00	50.60 51.60	..... .....	61 14 6.32 298 45 19.55	+ 0.99 + 1.98	-11.23 + 8.35	+1 43.02 -1 43.03	-22 20 39.60
6	7 Pyxidis	W E	3 ...	8 44 14.0 8 49 5.0	2 32.1 2 18.9	50.30 49.80	50.85 50.55	..... .....	293 44 37.35 66 14 44.38	+ 1.23 + 0.82	+ 9.52 - 7.94	-2 8.31 +2 8.33	-27 21 46.38
7	ν Cancri	E W	3 ...	8 54 47.0 8 59 43.5	2 40.1 2 16.4	50.05 50.95	50.70 51.55	..... .....	14 5 54.90 345 53 39.02	+ 1.04 + 1.93	-40.51 +29.42	+ 14.27 - 14.27	+24 49 29.72
8	March 27, L. ε Canis Majoris	W E	3.5 ...	6 52 24.0 6 57 38.0	2 44.9 2 29.1	49.70 50.10	50.90 51.30	..... .....	292 15 32.35 67 43 48.92	+ 0.42 + 0.84	+10.92 - 8.93	-2 15.08 +2 15.15	-28 50 57.16
9	α Geminorum	E W	2 ...	7 33 ..... .....	..... .....	50.65 50.85	51.35 51.50	27.273 27.273	4 5 9.25 355 50 54.78	+ 1.88 + 2.04	+ 0.23 - 0.23	+ 4.03 - 4.03	+34 48 5.10
10	β Geminorum	W E	3 ...	7 37 12.3 7 42 5.7	2 33.5 2 19.9	50.20 50.15	50.80 51.00	..... .....	349 19 5.12 10 40 11.15	+ 0.64 + 0.73	+47.56 -39.52	- 10.55 + 10.55	+28 15 15.45
11	3 Cancri	E W	2.5 ...	7 53 8.5 7 57 15.0	2 27.9 1 38.6	50.65 50.85	51.50 51.55	..... .....	21 20 59.85 338 38 33.60	+ 1.22 + 1.34	-24.30 +10.80	+ 21.89 - 21.89	+17 33 59.12
12	ρ Argūs	W E	4 ...	8 1 19.0 8 6 8.0	2 26.7 2 22.3	50.45 50.35	51.15 51.25	..... .....	297 3 53.82 62 55 27.45	+ 0.96 + 0.94	+ 9.36 - 8.81	-1 49.14 +1 49.17	-24 2 10.36
13	θ Cancri	E W	2 ...	8 23 40.5 8 28 33.5	2 46.1 2 6.9	50.55 50.95	51.40 51.75	..... .....	20 30 19.82 339 29 12.58	+ 1.11 + 1.51	-31.70 +18.51	+ 20.98 - 20.98	+18 24 47.22
14	7 Cancri	W E	2.5 ...	8 35 11.5 8 40 6.7	2 51.8 2 3.4	49.95 50.05	50.80 50.70	..... .....	342 52 32.95 17 6 31.92	+ 0.49 + 0.50	+39.52 -20.39	- 17.29 + 17.29	+21 48 29.70
15	7 Pyxidis	E W	3.5 ...	8 44 13.0 8 49 15.0	2 33.1 2 28.9	50.15 50.85	50.90 51.55	..... .....	66 14 47.45 293 44 34.72	+ 0.65 + 1.34	- 9.65 + 9.13	+2 6.83 -2 6.85	-27 21 46.95
16	ν Cancri	W E	2 ...	8 54 45.0 8 59 40.3	2 42.0 2 13.3	49.85 49.90	50.50 50.75	..... .....	345 53 27.88 14 5 43.18	+ 0.30 + 0.47	+41.49 -28.09	- 14.12 + 14.12	+24 49 29.46
17	March 28, L. α Geminorum	W E	2.5 ...	7 33 ..... .....	..... .....	49.75 49.55	51.05 50.80	26.866 26.866	355 51 13.30 4 5 28.38	+ 0.21 - 0.02	- 0.23 + 0.23	- 4.02 + 4.02	+34 48 4.84
18	β Geminorum	E W	3 ...	7 37 16.5 7 41 38.7	2 29.4 1 52.8	49.45 50.45	50.75 51.70	..... .....	10 40 16.92 349 19 22.55	+ 0.61 + 1.63	-45.05 +25.70	+ 10.52 - 10.52	+28 15 14.70
19	3 Cancri	W E	3 ...	7 52 39.5 7 57 33.0	2 57.0 1 56.5	49.70 49.50	50.95 50.70	..... .....	338 38 10.65 21 20 51.75	+ 0.88 + 0.62	+34.80 -15.08	- 21.83 + 21.84	+17 33 59.20
20	β Cancri	E W	2.5 ...	8 8 47.0 8 13 41.0	2 50.6 2 3.4	49.85 50.95	51.00 52.05	..... .....	29 26 19.05 330 33 12.48	+ 0.95 + 2.07	-24.78 +12.97	+ 31.51 - 31.51	+ 9 28 31.16

Time.	Ther. 3842.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
25 7 40	59.3	.....	29.816	9. Instrument in meridian, observation at I with movable thread.						1	359 59 43.04	+23.78
7 55	59.2	60.4	29.816	17. Instrument in meridian, observation at IX with movable thread.						2	42.88	+10.59
8 13	58.6	.....	.....							3	43.26	- 1.92
8 24	58.6	.....	.....							4	43.64	+11.52
8 36	58.6	.....	.....							5	42.98	+21.00
8 47	58.2	.....	.....							6	42.68	+21.51
8 57	58.3	59.7	29.819							7	42.90	+ 8.41
27 6 55	68.1	69.4	29.836							8	42.30	.....
7 30	66.5	.....	.....							9	42.10	+ 4.61
7 40	66.2	.....	.....							10	41.84	.....
7 55	65.6	.....	.....							11	41.26	+10.55
8 4	65.3	66.9	29.842							12	41.88	.....
8 27	64.9	.....	.....							13	40.92	+10.26
8 38	64.6	.....	.....							14	42.50	.....
8 47	64.5	.....	.....							15	41.81	+21.77
8 57	64.2	65.9	29.851							16	42.62	+ 8.29
28 7 28	68.2	70.3	29.871							17	42.44	+ 4.56
7 45	67.8	.....	.....							18	41.18	.....
7 55	67.5	.....	.....							19	41.82	+10.52
8 11	67.5	.....	.....							20	41.37	.....

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	0 Cancri	W	3	8 23 30.0	2 47.7	49.85	50.80	.....	339 29 0.40	+ 0.86	+32.31	- 20.93	+18 24 47.32
		E	...	8 28 37.5	2 10.8	49.85	50.75	.....	20 30 8.92	+ 0.85	-19.66	+ 20.94	
2	γ Cancri	E	3	8 35 23.5	2 39.8	49.70	50.60	.....	17 6 45.02	+ 0.68	-34.19	+ 17.24	+21 48 29.90
		W	...	8 40 15.0	2 11.7	50.85	51.70	.....	342 52 47.08	+ 1.83	+23.23	- 17.24	
3	α Cancri	W	3	8 50 44.0	2 49.6	49.70	50.80	.....	333 17 47.10	+ 0.80	+26.55	- 28.16	+12 13 21.22
		E	...	8 55 37.0	2 3.4	49.30	50.15	.....	20 41 22.52	+ 0.26	-14.06	+ 28.16	
4	κ Cancri	E	2.5	9 0 12.5	2 39.7	49.35	50.10	.....	27 52 0.08	+ 0.26	-22.72	+ 29.62	+11 2 50.92
		W	...	9 5 9.0	2 16.8	50.55	51.60	.....	332 7 27.38	+ 1.63	+16.67	- 29.63	
5	h Mali	W	3.5	9 14 49.0	2 44.4	49.75	50.55	.....	295 32 10.95	+ 0.70	+11.46	-1 56.78	-25 33 58.16
		E	...	9 20 36.0	3 2.6	49.50	50.20	.....	64 27 12.60	+ 0.38	-14.14	+1 56.85	
6	160 G. Hydræ	E	3	9 26 40.0	2 26.4	49.95	50.70	.....	59 35 32.50	+ 0.87	- 9.86	+1 35.39	-20 42 0.58
		W	...	9 31 30.0	2 23.6	50.95	51.70	.....	300 23 48.75	+ 1.90	+ 9.49	-1 35.43	
7	0 Antlæ	W	3.5	9 37 36.0	2 38.6	50.00	50.85	.....	293 45 58.45	+ 0.98	+10.36	-2 6.82	-27 20 22.51
	March 29, L.	E	...	9 42 26.0	2 11.4	49.45	50.10	.....	66 13 21.00	+ 0.30	- 7.11	+2 6.84	
8	α Canis Minoris	W	3	7 31 52.0	2 43.4	52.60	47.40	.....	326 32 33.92	+ 0.16	+20.46	- 36.58	+ 5 27 52.83
		E	...	7 36 39.0	2 3.6	52.75	47.40	.....	33 26 40.20	+ 0.24	-11.71	+ 36.61	
9	3 Cancri	E	2.5	7 52 44.5	2 52.0	50.55	49.70	.....	21 21 8.55	+ 0.91	-32.86	+ 21.72	+17 33 58.90
		W	...	7 57 37.5	2 1.0	50.90	50.25	.....	338 38 27.18	+ 1.37	+16.27	- 21.73	
10	β Cancri	W	3	8 8 35.0	3 2.6	49.40	49.05	.....	330 32 50.80	- 0.01	+28.39	- 31.40	+ 9 28 31.36
		E	...	8 13 53.0	2 15.4	49.85	49.45	.....	29 26 10.88	+ 0.41	-15.61	+ 31.41	
11	110 B. Lyncis	E	...	8 27 .....	.....	50.15	49.90	27.924	0 32 21.00	+ 1.52	+ 0.26	+ 0.56	+38 20 29.46
		W	...	.....	.....	50.95	50.15	27.924	359 22 47.95	+ 2.08	- 0.26	- 0.56	
12	δ Cancri	W	3	8 36 46.0	2 47.2	49.75	49.20	.....	339 34 17.22	+ 0.23	+32.23	- 20.74	+18 30 3.04
		E	...	8 41 47.5	2 14.3	49.85	49.50	.....	20 24 54.32	+ 0.44	-20.80	+ 20.74	
13	α Cancri	E	2.5	8 50 40.0	2 53.6	49.80	49.40	.....	26 41 35.85	+ 0.38	-27.82	+ 28.03	+12 13 20.96
	March 31, L.	W	...	8 55 43.0	2 9.4	50.55	50.00	.....	333 17 56.80	+ 1.08	+15.46	- 28.03	
14	α Canis Minoris	E	3	7 31 44.0	2 51.2	50.90	51.15	.....	33 26 48.40	+ 1.93	-22.45	+ 37.38	+ 5 27 52.57
		W	...	7 36 45.5	2 10.3	51.05	51.40	.....	326 32 39.60	+ 2.12	+13.01	- 37.39	
15	110 B. Lyncis	W	2	8 27 .....	.....	49.15	49.75	27.961	359 22 51.25	- 0.36	- 0.26	- 0.58	+38 20 29.43
		E	...	.....	.....	50.40	50.80	27.961	0 32 22.60	+ 0.80	+ 0.26	+ 0.58	
16	δ Cancri	E	2.5	8 36 39.5	2 53.6	50.85	50.90	.....	20 25 5.52	+ 1.83	-34.75	+ 21.22	+18 30 4.39
		W	...	8 41 34.5	2 1.4	50.75	50.50	.....	339 34 32.20	+ 1.56	+17.00	- 21.23	
17	10 Ursæ Majoris	W	2	8 54 .....	.....	50.35	50.35	25.855	3 13 14.28	+ 0.56	- 0.30	- 3.23	+42 9 31.29
	April 3, L.	E	...	.....	.....	50.35	50.55	25.855	356 44 50.52	+ 0.66	+ 0.30	- 3.23	
18	σ Hydræ	E	3	8 31 9.5	2 53.8	51.05	51.00	.....	35 14 21.98	+ 0.62	-22.16	+ 40.48	+ 3 40 16.64
		W	...	8 36 12.0	2 8.7	51.60	51.40	.....	324 45 8.38	+ 1.10	+12.16	- 40.50	
19	ε Hydræ	W	3	8 39 30.5	2 30.1	51.25	51.25	.....	327 50 33.12	+ 0.84	+17.84	- 36.05	+ 6 45 50.69
		E	...	8 44 21.5	2 20.9	50.95	51.10	.....	32 8 46.48	+ 0.61	-15.72	+ 36.07	

Time.	Ther. 3892	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
28 5 26	66.6	68.4	29.87	11. Instrument in meridian, observation at I with movable thread						1	139 59 41.84	+10.21
8 15	66.3			15. 17. Instrument in meridian, observation at IX with movable thread.						2	42.12	
8 11	66.2									3	41.68	
9 3	66.0									4	41.64	
9 18	61.1									5	41.01	
9 29	64.7									6	41.80	+19.01
9 41	64.5	66.8	29.881							7	47.00	+19.51
10 7 17	70.1	72.6	29.896							8	41.65	
2 66	69.2									9	40.70	+10.46
8 11	68.2	70.9	29.822							10	41.94	
8 46	68.0									11	41.00	
8 51	67.5	70.4	29.851							12	41.82	
11 2 17	61.6	65.1	30.048							13	40.88	
8 23	66.9	63.0	30.040							14	41.10	
8 19	66.2									15	41.18	
8 51	69.2	61.8	30.044							16	41.68	
8 19	61.2	55.6	29.778							17	41.71	
8 47	67.2									18	41.03	
										19	41.69	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	10 Ursæ Majoris	E W	3 ...	8 54 .... .....	. .... .....	50.80 51.45	50.65 51.50	25.830 25.830	356 44 48.92 3 13 11.88	+ 1.04 + 1.81	+ 0.30 - 0.30	- 3.25 + 3.25	+42 9 31.35
2	κ Cancri	W E	2.5 ...	9 0 4.5 9 5 5.0	2 47.6 2 12.9	51.30 50.75	51.30 50.70	..... .....	332 7 20.88 27 51 51.15	+ 0.90 + 0.31	+25.03 -15.74	- 30.39 + 30.40	+11 2 51.68
3	h Mali	E W	4 ...	9 14 51.0 9 19 50.0	2 42.3 2 16.7	50.95 51.65	50.75 51.75	..... .....	64 27 6.45 295 32 15.52	+ 0.43 + 1.30	-11.17 + 7.93	+1 59.72 -1 59.74	-25 33 58.68
4	160 G. Hydræ	W E	4 ...	9 26 18.0 9 31 14.0	2 48.2 2 7.8	51.20 50.90	50.95 50.65	..... .....	300 23 49.52 59 35 28.08	+ 0.67 + 0.36	+13.02 - 7.52	-1 37.72 +1 37.74	-20 42 0.05
5	θ Antliæ	E W	4 ...	9 37 38.0 9 42 26.0	2 36.3 2 11.7	50.95 51.65	50.65 51.45	..... .....	66 13 20.80 293 46 2.28	+ 0.38 + 1.15	-10.06 + 7.14	+2 9.91 -2 9.93	-27 20 23.67
6	ν Leonis	W E	2.5 ...	9 50 56.5 9 55 37.0	2 26.3 2 14.2	51.15 51.00	50.90 50.85	..... .....	333 58 13.98 26 1 4.12	+ 0.62 + 0.51	+20.18 -16.98	- 28.11 + 28.11	+12 53 41.99
7	ζ Leonis	E W	3 ...	10 8 48.7 10 13 42.5	2 51.9 2 1.9	50.70 51.70	50.45 51.45	..... .....	15 2 6.48 344 57 36.70	+ 0.15 + 1.18	-44.10 +22.23	+ 15.48 - 15.48	+23 53 19.89
8	μ Hydræ	W E	4 ...	10 19 4.0 10 24 0.0	2 42.1 2 13.9	51.40 51.00	51.05 50.50	..... .....	304 44 14.90 55 15 4.45	+ 0.82 + 0.34	+13.02 - 8.88	-1 22.89 +1 22.91	-16 21 19.95
9	April 6, L. 48 Leonis	W E	2.5 3	10 27 12.5 10 32 2.0	2 54.5 1 55.0	50.05 49.70	50.35 50.30	..... .....	328 30 57.62 31 28 8.20	+ 0.51 + 0.28	+24.54 -10.66	- 35.07 + 35.07	+ 7 26 23.89
10	39 Ursæ Majoris	E W	3 ...	10 35 27.5 10 40 3.0	2 32.5 2 3.0	50.00 50.20	50.30 50.50	..... .....	341 13 6.02 18 46 7.48	+ 0.45 + 0.65	+16.38 -10.66	- 19.49 + 19.50	+57 41 53.33
11	April 7, L. A Hydræ	E W	3 ...	9 27 1.0 9 32 13.0	3 3.2 2 8.8	50.55 50.40	50.45 50.20	..... .....	44 24 1.00 315 35 29.78	+ 1.23 + 1.03	-20.25 +10.01	+ 57.15 - 57.17	- 5 29 41.21
12	14 Leonis Minoris	W E	3 ...	9 41 .... .....	. .... .....	50.30 50.00	49.90 49.65	25.384 25.384	6 37 16.25 353 21 23.85	+ 0.11 - 0.18	- 0.35 + 0.35	+ 6.80 - 6.80	+45 33 19.33
13	ν Leonis	E W	3 ...	9 50 45.0 9 55 39.0	2 37.7 2 16.3	49.55 50.50	49.15 50.10	..... .....	26 1 8.52 333 58 18.28	+ 0.07 + 1.05	-23.45 +17.51	+ 28.56 - 28.56	+12 53 43.82
14	ζ Leonis	W E	3 ...	10 9 7.0 10 13 53.0	2 33.5 2 12.5	49.55 49.70	49.00 49.45	..... .....	344 57 25.08 15 1 49.38	- 0.02 + 0.28	+35.24 -26.26	- 15.73 + 15.73	+23 53 19.25
15	48 Leonis	E W	3 ...	10 27 20.5 10 32 17.5	2 46.3 2 10.7	50.15 50.50	49.50 49.70	..... .....	31 28 18.08 328 31 8.55	+ 0.57 + 0.84	-22.28 +13.77	+ 35.87 - 35.87	+ 7 26 24.05
16	34 Sextantis	W E	3 ...	10 35 50.0 10 40 17.0	2 9.3 2 17.7	50.00 50.00	49.20 49.40	..... .....	325 9 26.62 34 49 55.70	+ 0.32 + 0.42	+12.39 -14.05	- 40.77 + 40.77	+ 4 4 34.39
17	April 9, L. σ Hydræ	W E	2.5 ...	8 31 20.5 8 36 15.0	2 42.7 2 11.8	47.90 49.45	49.00 50.45	..... .....	324 45 3.22 35 14 12.28	+ 0.43 + 1.97	+19.43 -12.75	- 40.37 + 40.38	+ 3 40 16.96
18	ε Hydræ	E W	2.5 ...	8 39 24.5 8 44 3.0	2 35.9 2 2.6	49.30 48.30	50.35 49.35	..... .....	32 8 48.38 327 50 38.50	+ 1.83 + 0.81	-19.24 +11.90	+ 35.93 - 35.94	+ 6 45 50.72
19	κ Ursæ Majoris	W E	2 ...	8 57 .... .....	. .... .....	47.85 49.10	48.90 50.20	26.223 26.223	8 35 19.80 351 22 12.62	- 0.38 + 0.92	- 0.37 + 0.37	+ 8.67 - 8.67	+47 31 57.78

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	
3 8 53	51.9	....	....	1. Instrument in meridian, observation at I with movable thread.	1	359 59 40.94	....
9 3	51.6	....	....	12. 19. Instrument in meridian, observation at IX with movable thread.	2	41. 27	....
9 18	51.5	....	....		3	40. 22	....
9 35	51.0	53.2	29.771		4	42. 08	+10.39
9 40	50.9	....	....		5	40. 84	+20.00
9 53	50.6	....	....		6	41. 22	+10.78
10 12	50.2	....	....		7	41. 28	....
10 22	50.1	....	....		8	42. 34	....
10 37	49.9	51.0	29.754		9	40. 24	+11.35
6 10 30	48.1	49.7	29.462		10	40. 16	- 0.84
10 43	47.6	49.1	29.460		11	41. 39	+10.01
7 9 26	40.3	41.9	29.538		12	40. 92	+ 1.04
9 39	39.6	....	....		13	40. 00	+10.51
9 53	39.2	....	....		14	41. 85	....
10 12	39.1	....	....		15	39. 76	+11.31
10 30	38.6	....	....		16	40. 70	....
10 41	38.6	40.1	29.542		17	42. 30	....
9 8 34	53.0	55.7	29.706		18	41. 08	....
8 47	52.6	....	....		19	41. 65	....
8 55	52.3	....	....		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	28 Hydræ	E W	3.5	9 18 8.0 9 23 5.0	2 46.9 2 10.1	51.05 50.05	51.05 50.05	..... .....	43 37 0.50 316 22 25.60	+ 1.55 + 0.54	-17.07 +10.38	+ 54.63 - 54.63	- 4 42 42.32
2	A Hydræ	W E	3.5	9 27 17.0 9 32 20.0	2 47.3 2 15.7	49.70 50.95	49.80 51.10	..... .....	315 35 21.92 44 23 53.40	+ 0.22 + 1.52	+16.80 -11.11	- 56.16 + 56.18	- 5 29 42.02
3	14 Leonis Minoris	E W	2	9 41 ..... .....	..... .....	50.85 50.15	50.95 50.15	25.265 25.265	353 21 24.90 6 37 19.80	+ 2.11 + 1.36	+ 0.35 - 0.35	- 6.68 + 6.68	+45 33 19.94
4	158 B. Cephei s. p.	E W	3.5	9 49 26.0 9 54 25.0	2 28.5 2 30.5	50.55 50.50	48.95 48.95	..... .....	292 12 19.10 67 46 57.95	+ 1.07 + 1.06	- 2.91 + 2.09	-2 19.78 +2 19.82	+73 15 1.29
5	31 Leonis Minoris	W E	2.5	10 22 ..... .....	..... .....	49.55 50.80	48.00 49.05	26.139 26.139	358 15 10.45 1 42 28.90	- 0.63 + 0.54	- 0.25 + 0.25	+ 1.74 + 1.74	+37 11 34.74
6	34 Sextantis	E W	3	10 35 20.5 10 40 2.0	2 38.9 2 2.6	50.80 50.25	49.05 48.65	..... .....	34 49 59.48 325 9 26.35	+ 1.26 + 0.77	-18.71 +11.14	+ 40.05 - 40.06	+ 4 4 34.60
7	April 13, L. Ursæ Majoris	E W	2	8 53 ..... .....	..... .....	50.30 49.75	50.50 49.65	27.531 27.531	350 28 20.40 9 27 18.15	+ 1.63 + 0.90	+ 0.38 - 0.38	- 9.48 + 9.48	+48 24 54.15
8	April 16, L. Leonis Minoris	E W	3	9 28 ..... .....	..... .....	50.70 52.20	49.70 51.25	28.696 28.696	2 3 9.78 357 50 56.05	+ 1.68 + 3.23	+ 0.25 - 0.25	+ 2.16 - 2.16	+36 49 8.04
9	ε Leonis	W E	2.5	9 38 11.0 9 43 12.5	2 32.3 2 29.2	51.35 50.40	50.40 49.40	..... .....	345 16 39.42 14 42 41.18	+ 1.63 + 0.64	+35.34 -33.92	- 15.45 + 15.45	+24 12 35.34
10	π Leonis	E W	3	9 53 2.0 9 57 43.0	2 25.5 2 15.5	50.60 52.35	49.20 51.05	..... .....	30 24 51.55 229 34 32.55	+ 0.64 + 2.48	-17.55 +15.22	+ 34.55 - 34.55	+ 8 29 49.80
11	λ Ursæ Majoris	W E	3	10 11 ..... .....	..... .....	51.45 50.15	49.95 48.70	25.403 25.403	4 27 17.88 355 31 23.18	+ 0.73 - 0.57	- 0.31 + 0.31	+ 4.60 - 4.60	+43 23 18.83
12	31 Leonis Minoris	E W	2.5	10 22 ..... .....	..... .....	50.55 52.50	49.10 50.95	26.003 26.003	1 42 31.65 358 15 13.92	+ 1.30 + 3.23	+ 0.25 - 0.25	+ 1.78 - 1.78	+37 11 36.61
13	37 Leonis Minoris	W E	3	10 33 ..... .....	..... .....	51.90 50.40	50.50 48.85	25.190 25.190	353 32 25.92 6 26 30.55	+ 1.24 - 0.37	- 0.22 + 0.22	- 6.67 + 6.67	+32 28 8.14
14	41 Leonis Minoris	E W	3	10 37 33.0 10 41 7.5	0 58.1 2 36.4	50.50 52.60	49.00 50.95	..... .....	15 13 44.32 344 45 5.35	+ 0.49 + 2.56	- 4.99 +36.16	+ 16.07 - 16.09	+23 41 2.58
15	φ Ursæ Majoris	W E	3	11 4 ..... .....	..... .....	51.55 50.15	50.00 48.60	26.078 26.078	6 4 19.12 353 53 26.30	+ 0.81 - 0.62	- 0.34 + 0.34	+ 6.31 - 6.31	+45 0 49.64
16	σ Leonis	E W	3	11 13 45.0 11 18 41.0	2 45.5 2 10.5	50.50 52.80	48.75 51.05	..... .....	32 21 52.62 327 37 35.28	+ 0.36 + 2.71	-21.56 +13.41	+ 37.43 - 37.43	+ 6 32 49.10
17	ζ Hydræ	W E	4	11 26 0.0 11 30 47.0	2 36.4 2 10.6	52.10 50.10	50.30 48.30	..... .....	289 46 44.55 70 12 32.50	+ 1.98 - 0.08	+ 9.42 - 6.57	-2 42.90 +2 42.92	-31 20 11.32
18	April 17, L. Leonis Minoris	W E	3	9 28 ..... .....	..... .....	50.35 51.10	49.80 50.70	28.900 28.900	357 50 50.85 2 3 3.22	- 0.22 + 0.62	- 0.25 + 0.25	- 2.16 + 2.16	+36 49 7.53
19	ε Leonis	E W	2.5	9 38 3.7 9 43 8.5	2 39.6 2 25.2	51.45 51.15	50.60 50.50	..... .....	14 42 42.90 345 16 42.45	+ 1.40 + 1.28	-38.81 +32.13	+ 15.47 - 15.47	+24 12 36.22

Time	Ther. 3862	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
1 8-00	51.5	51.5	29.706	3, 7, 8, 12. Instrument in meridian, observation at I with movable thread. 5, 11, 13, 15, 18. Instrument in meridian, observation at IX with movable thread.	1	359 59 40.75	+ 16.09
2 9-21	51.2	51.2	29.706		2	41.43	+ 16.07
3 10-19	51.0	51.0	29.706		3	40.14	+ 0.79
4 11-12	51.0	51.0	29.706		4	39.05	
5 12-13	51.0	51.0	29.706		5	41.47	
6 1-18	51.3	51.3	29.706		6	40.14	
7 2-11	51.0	51.0	29.706		7	39.12	
8 3-16	51.0	51.0	29.706		8	41.53	
9 4-17	51.0	51.0	29.706		9	42.14	
10 5-19	51.0	51.0	29.706		10	42.44	
11 6-20	51.0	51.0	29.706		11	42.40	
12 7-21	51.0	51.0	29.706		12	41.24	
13 8-22	51.0	51.0	29.706		13	41.60	
14 9-23	51.0	51.0	29.706		14	41.94	
15 10-24	51.0	51.0	29.706		15	42.06	
16 11-25	51.0	51.0	29.706		16	41.41	
17 12-26	51.0	51.0	29.706		17	40.91	
18 1-27	51.0	51.0	29.706		18	41.72	
19 2-28	51.0	51.0	29.706		19	40.72	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	π Leonis	W E	2.5 ...	9 52 51.0 9 57 59.0	2 36.4 2 31.6	50.85 51.35	50.05 50.70	..... .....	329 34 28.22 30 24 52.35	+ 0.89 + 1.48	+20.27 -19.05	- 34.56 + 34.57	+ 8 29 49.29
2	λ Ursæ Majoris	E W	2 ...	10 11 ..... .....	..... .....	51.65 51.65	50.75 50.65	25.375 25.375	355 31 19.88 4 27 16.55	+ 2.40 + 2.35	+ 0.31 - 0.31	- 4.61 + 4.60	+43 23 19.15
3	μ Hydræ	E W	2.5 ...	10 19 5.0 10 24 4.0	2 40.8 2 18.2	51.35 51.35	50.55 50.50	..... .....	55 15 5.38 304 44 18.38	+ 1.40 + 1.39	-12.81 + 9.46	+1 24.80 -1 24.84	-16 21 22.03
4	41 Leonis Minoris	W E	2.5 ...	10 35 52.5 10 40 55.0	2 38.6 2 23.9	50.55 51.50	49.80 50.65	..... .....	344 45 7.00 15 14 8.50	+ 0.62 + 1.54	+37.18 -30.61	- 16.10 + 16.10	+23 41 3.13
5	ψ Ursæ Majoris	E W	2.5 ...	11 4 ..... .....	..... .....	52.10 51.80	50.85 50.50	26.004 26.004	353 53 25.65 6 4 20.42	+ 2.69 + 2.35	+ 0.34 - 0.34	- 6.32 + 6.32	+45 0 49.75
6	σ Leonis	W E	2.5 ...	11 13 47.0 11 18 54.5	2 43.4 2 24.1	51.00 51.60	49.85 50.30	..... .....	327 37 30.72 32 21 45.12	+ 0.88 + 1.43	+21.02 -16.35	- 37.52 + 37.51	+ 6 32 50.25
7	April 18, L. ϵ Ursæ Majoris	W E	2.5 ...	8 53 ..... .....	..... .....	51.45 51.30	50.85 51.05	..... .....	9 27 17.08 350 28 18.82	0.00 + 0.02	- 0.38 + 0.38	- 9.83 + 9.83	+48 24 55.12
8	23 Leonis	E W	2 ...	9 43 40.0 9 48 38.5	2 20.4 2 29.1	52.60 52.00	51.50 50.75	..... .....	25 24 17.42 334 34 57.55	+ 1.64 + 0.97	-18.95 +21.37	+ 28.04 - 28.06	+13 30 28.39
9	193 G. Hydræ	W E	3 ...	9 57 32.0 10 2 54.0	2 41.7 2 40.3	51.00 51.50	49.70 50.35	..... .....	297 16 14.98 62 43 4.75	- 0.06 + 0.51	+11.42 -11.22	-1 54.16 +1 54.20	-23 49 51.48
10	37 Leonis Minoris	E W	3 ...	10 33 ..... .....	..... .....	51.70 52.10	50.50 50.70	25.042 25.042	6 26 32.20 353 32 29.70	+ 1.41 + 1.71	+ 0.22 - 0.22	+ 6.70 - 6.70	+32 28 8.53
11	ν Ursæ Majoris	W E	3 ...	11 13 ..... .....	..... .....	51.35 51.00	49.90 49.65	26.176 26.176	354 40 19.88 5 17 15.55	- 0.54 - 0.84	- 0.22 + 0.22	- 5.52 + 5.52	+33 36 43.13
12	April 19, L. κ Ursæ Majoris	E W	3 ...	8 57 ..... .....	..... .....	50.50 50.75	50.95 51.10	26.169 26.169	351 22 11.50 8 35 18.12	+ 0.78 + 0.97	+ 0.37 - 0.37	- 8.63 + 8.62	+47 31 58.21
13	April 20, L. ν^2 Boötis	W E	3.5 ...	15 28 ..... .....	..... .....	49.30 49.20	50.25 49.90	25.433 25.433	2 17 10.58 357 41 23.52	+ 0.24 + 0.02	- 0.29 + 0.29	+ 2.24 - 2.24	+41 13 12.14
14	γ Coronæ Borealis	E W	...	15 36 35.5 15 41 41.5	2 26.0 2 40.0	49.00 49.50	49.60 50.40	..... .....	12 19 38.38 347 39 31.15	+ 0.49 + 1.15	-37.88 +45.49	+ 12.19 - 12.20	+26 35 42.75
15	λ Libræ	W E	...	15 45 52.0 15 50 43.0	2 13.7 2 37.3	49.55 49.30	50.45 49.95	..... .....	301 12 49.08 58 46 33.88	+ 1.20 + 0.82	+ 8.34 -11.54	-1 31.72 +1 31.73	-19 52 57.45
16	ω^2 Scorpii	W E	3 ...	15 59 23.0 16 4 47.0	2 43.5 2 40.5	49.25 49.30	49.90 50.05	..... .....	300 29 13.82 59 30 16.60	+ 0.77 + 0.87	+12.32 -11.87	-1 34.46 +1 34.48	-20 36 42.27
17	σ^2 Coronæ Borealis	E W	3.5 ...	16 11 ..... .....	..... .....	49.30 49.75	50.10 50.60	27.698 27.698	4 47 3.70 355 8 22.48	+ 1.63 + 2.11	+ 0.22 - 0.22	+ 4.71 - 4.71	+34 5 51.25
18	ρ Ophiuchi (<i>s. star</i>)	W E	3.5 ...	16 17 46.0 16 22 48.0	2 23.7 2 38.3	49.35 49.55	50.15 50.25	..... .....	297 52 20.38 62 7 0.58	+ 0.94 + 1.10	+ 9.11 -11.05	-1 45.14 +1 45.16	-23 13 38.70
19	τ Scorpii	E W	3.5 ...	16 27 42.0 16 32 56.0	2 32.6 2 41.4	49.55 49.50	50.15 50.15	..... .....	66 53 59.58 293 5 19.42	+ 1.05 + 1.02	- 9.48 +10.61	+2 10.17 -2 10.19	-28 1 3.68

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
17 9 55	41.1	.....	.....	2, 5, 10, 12, 17. Instrument in meridian, observation at I with movable thread.						1	359 59 42.08	.....
10 9	40.7	.....	.....	7, 11, 13. Instrument in meridian, observation at IX with movable thread.						2	41.12	.....
10 22	40.5	42.0	29.841							3	40.19	.....
10 39	39.6	.....	.....							4	42.12	.....
11 2	38.2	.....	.....							5	41.78	.....
11 17	38.5	40.1	29.842							6	41.40	.....
18 8 51	43.5	45.4	29.932							7	.....	.....
9 46	41.6	42.5	29.956							8	39.99	+ 9.75
10 0	41.2	.....	.....							9	40.21	+19.70
10 32	40.2	.....	.....							10	39.45	.....
11 12	39.6	40.8	29.976	Notes.						11	40.28	.....
19 8 56	58.0	60.9	29.888	7. No micrometer record.						12	38.64	.....
20 15 26	64.2	65.4	29.632	13. Hazy.						13	40.09	+ 4.71
15 39	64.2	.....	.....	14 E. One level reading increased 1 div.						14	39.38	+ 4.40
15 48	64.2	.....	.....	18. Assumed that south star was observed.						15	40.90	.....
16 2	63.7	.....	.....							16	41.26	- 2.37
16 15	63.5	.....	.....							17	40.36	.....
16 21	63.2	64.7	29.622							18	40.54	- 3.89
16 30	63.2	.....	.....							19	41.09	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	49 Herculis	W E	3.5 ...	16 45 22.0 16 50 44.0	2 30.5 2 42.5	48.45 49.15	49.20 49.95	..... .....	336 12 21.60 23 47 2.22	+ 0.00 + 0.74	+25.83 -26.81	- 24.64 + 24.64	+15 7 57.55
2	98 H ¹ . Herculis	E W	3 ...	17 5 ..... .....	..... .....	49.40 49.60	50.05 50.15	26.727 26.727	358 15 24.75 1 41 23.55	+ 1.65 + 1.80	+ 0.20 - 0.29	- 1.67 + 1.67	+40 38 17.41
3	ε Ophiuchi	W E	4 ...	17 12 55.0 17 18 10.0	2 30.9 2 44.1	48.70 49.20	49.15 50.00	..... .....	300 5 14.65 59 54 9.25	+ 0.10 + 0.80	+11.70 -12.33	-1 36.22 +1 36.22	-21 0 35.31
4	β Draconis	E W	3 ...	17 25 48.5 17 31 10.7	2 44.9 2 43.3	49.60 49.50	50.15 50.05	..... .....	346 32 31.28 13 26 49.18	+ 1.07 + 0.97	+30.20 -29.70	- 13.38 + 13.30	+52 22 8.84
5	φ ¹ Draconis	W E	4 ...	17 41 0.0 17 46 37.0	2 45.6 2 42.4	48.80 49.00	49.35 49.60	..... .....	33 15 20.12 326 43 52.48	+ 0.26 + 0.49	- 6.40 + 6.24	+ 36.71 - 36.73	+72 11 35.11
6	γ Draconis	E W	3 ...	17 52 16.0 17 59 47.0	2 24.2 2 6.8	49.20 49.40	49.60 50.25	..... .....	347 24 54.60 12 34 20.92	+ 0.60 + 1.02	+25.23 -19.51	- 12.51 + 12.51	+51 29 50.06
7	36 Camelop. s. p.	W E	4 ...	18 1 40.0 18 5 44.0	1 51.6 2 12.4	49.40 48.95	49.95 49.35	..... .....	75 16 30.08 284 42 50.68	+ 0.87 + 0.33	+ 2.25 - 3.16	+3 30.00 -3 30.05	+65 44 20.75
8	447 B. Herculis	E W	3 ...	18 16 5.0 18 21 31.5	2 47.9 2 38.6	49.15 49.20	49.65 49.60	..... .....	21 8 27.25 338 50 50.12	+ 0.52 + 0.52	-31.57 +28.17	+ 21.70 - 21.71	+17 46 39.15
9	156 H ¹ . Draconis	W E	3 ...	18 32 38.0 18 38 3.0	1 59.8 3 25.2	48.40 48.70	49.40 49.40	..... .....	38 31 55.40 321 27 21.78	+ 0.08 + 0.23	- 2.12 + 6.22	+ 44.68 - 44.69	+77 28 13.80
10	12. Boötis	E W	3 ...	15 28 ..... .....	..... .....	49.90 51.00	50.45 51.45	25.676 25.676	357 41 10.95 2 16 58.82	+ 2.33 + 3.40	+ 0.29 - 0.29	- 2.30 + 2.30	+41 13 13.04
11	κ Libræ	W E	3.5 ...	15 34 10.0 15 39 25.0	2 34.9 2 40.1	50.45 49.80	50.80 50.20	..... .....	301 43 29.48 58 15 51.45	+ 2.07 + 1.44	+11.20 -12.06	-1 32.43 +1 32.45	-19 22 14.88
12	λ Libræ	E W	3 ...	15 45 17.0 15 50 43.0	2 48.6 2 37.4	50.30 50.85	50.50 51.30	..... .....	58 46 32.18 301 12 47.42	+ 1.83 + 2.52	-13.26 +11.56	+1 34.32 -1 34.33	-19 52 57.30
13	β ¹ Scorpii	W E	3 ...	15 57 22.0 16 2 54.0	2 49.2 2 42.8	50.10 49.65	50.40 50.00	..... .....	301 33 1.65 58 26 18.28	+ 1.68 + 1.23	+13.43 -12.43	-1 33.13 +1 33.15	-19 32 41.74
14	ε Ophiuchi	E W	3.5 ...	16 10 47.0 16 16 16.0	2 47.0 2 42.0	49.85 50.80	50.20 51.10	..... .....	43 21 50.22 316 37 19.98	+ 1.46 + 1.40	-17.18 +16.17	+ 54.10 - 54.20	- 4 27 40.11
15	98 B. Draconis	W E	3 ...	16 20 1.0 16 25 13.0	2 36.2 2 35.8	50.55 49.10	50.75 49.50	..... .....	16 29 35.12 343 29 43.60	+ 2.09 + 0.71	-20.69 +20.59	+ 17.01 - 17.01	+55 25 9.38
16	35 B. Camelop. s. p.	E W	3.5 ...	16 33 38.0 16 39 12.0	2 36.5 2 57.5	49.45 51.25	49.65 51.50	..... .....	294 43 15.82 65 16 3.38	+ 0.97 + 2.85	- 2.82 + 3.62	-2 4.13 +2 4.17	+75 46 11.35
17	49 Herculis	E W	2.5 ...	16 45 25.5 16 50 42.0	2 36.0 2 40.5	49.35 50.90	49.55 51.05	..... .....	23 46 57.98 336 12 19.20	+ 0.85 + 2.40	-24.71 +26.16	+ 25.34 - 25.34	+15 7 58.01
18	98 H ¹ . Herculis	W E	3 ...	17 5 ..... .....	..... .....	50.15 49.10	50.50 49.40	26.990 26.990	1 41 14.08 358 15 15.50	+ 1.03 - 0.07	- 0.29 + 0.20	+ 1.73 - 1.73	+40 38 17.84
19	ε Ophiuchi	E W	3.5 ...	17 13 7.0 17 18 6.0	2 27.9 2 31.1	49.30 51.05	49.65 51.20	..... .....	59 54 3.35 300 5 17.28	+ 0.90 + 2.58	-10.01 +10.45	+1 39.00 -1 39.03	-21 0 34.42
20	74 B. Camelop. s. p.	W E	4 ...	17 24 30.0 17 30 6.0	2 43.7 2 52.3	50.90 48.90	50.90 49.10	..... .....	66 3 11.38 293 56 10.12	+ 2.35 + 0.41	+ 3.22 - 3.56	- 2 9.04 -2 9.07	+74 58 59.40

Time	Ther. 582	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
20 16 48	62.9		29.625	Instrument in meridian, observation at I with movable thread.				1	359 59 41.79	
22 15	62.4	64.1	29.625	Instrument in meridian, observation at IX with movable thread.				2	41.62	+ 6.48
23 28	62.6							3	42.68	- 5.97
24 44	61.9							4	41.55	
25 55	61.5	61.8	29.627					5	41.04	
26 7	61.1							6	41.41	
26 18	61.2							7	40.50	- 3.68
26 16	60.2	62.6	29.616					8	40.50	+ 1.12
24 15 26	55.2	56.7	29.621					9	40.79	+16.04
15 17	55.0							10	40.58	+ 1.26
15 47	54.9							11	41.54	
16 5	54.6							12	41.12	
16 14	54.3	56.7	29.624					13	41.91	
16 24	54.2							14	41.02	
16 37	53.6							15	40.71	+ 5.12
16 48	53.6							16	40.91	
17 1	53.2	54.8	29.626					17	40.91	
17 16	52.9							18	41.77	+ 5.24
27 27	52.3							19	42.26	+ 5.97
								20	41.94	

Note.
1. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	324 B. Herculis	E W	2.5 ...	17 38 .....	... ...	49.05 51.00	49.15 51.30	27.363 27.363	355 22 26.10 4 33 30.55	+ 1.23 + 3.33	+ 0.32 - 0.32	- 4.63 + 4.63	+43 30 54.14
2	36 Camelop. s. p.	E W	4 ...	18 0 54.0 18 6 17.0	2 37.4 2 45.6	48.90 51.25	49.05 51.50	..... .....	284 42 59.00 75 16 19.42	+ 0.37 + 2.82	- 4.46 + 4.94	-3 36.12 +3 36.11	+65 44 21.19
3	447 B. Herculis	W E	3.5 ...	18 16 4.5 18 21 26.5	2 48.4 2 33.6	50.40 49.10	50.50 49.30	..... .....	338 50 54.20 21 8 20.98	+ 1.88 + 0.59	+31.76 -26.42	- 22.33 + 22.33	+17 46 40.58
4	156 H ¹ . Draconis	E W	3 ...	18 31 50.0 18 37 22.0	2 39.0 2 44.0	49.45 51.25	49.50 51.40	..... .....	321 27 25.30 38 31 54.52	+ 0.90 + 2.80	+ 3.73 - 3.97	- 45.96 + 45.96	+77 28 14.23
5	β Libræ April 30, L.	E W	3.5 ...	15 9 34.0 15 14 51.0	2 36.1 2 40.9	50.05 51.85	50.60 51.85	..... .....	47 56 6.85 312 3 13.50	+ 0.95 + 2.51	-13.75 +14.61	+1 3.04 -1 3.05	- 0 1 58.20
6	ν ² Boötis	W E	3 ...	15 28 .....	... ...	50.90 49.90	50.40 49.50	25.410 25.410	2 17 16.35 357 41 24.40	+ 0.56 - 0.41	- 0.29 + 0.29	+ 2.29 - 2.29	+41 13 15.02
7	κ Libræ	E W	3.5 ...	15 34 2.0 15 39 16.0	2 42.9 2 31.1	50.55 52.45	50.05 51.80	..... .....	58 15 54.35 301 43 29.42	+ 0.94 + 2.81	-12.49 +10.74	+1 31.93 -1 31.93	-19 22 15.28
8	χ Herculis	W E	2.5 ...	15 49 .....	... ...	50.65 51.05	49.95 50.15	26.317 26.317	3 46 22.28 356 11 4.35	+ 0.19 + 0.51	- 0.31 + 0.31	+ 3.78 - 3.78	+42 42 58.84
9	β ¹ Scorpii	E W	3.5 ...	15 57 28.0 16 2 47.0	2 43.2 2 35.8	51.70 52.00	51.00 51.10	..... .....	58 26 18.98 301 33 3.52	+ 2.04 + 2.25	-12.50 +11.39	+1 32.65 -1 32.70	-19 32 41.80
10	ε Ophiuchi	W E	3 ...	16 10 37.0 16 16 6.0	2 57.0 2 32.0	50.65 51.55	49.60 50.65	..... .....	316 37 20.42 43 21 58.02	+ 0.81 + 1.81	+19.30 -14.23	- 53.95 + 53.98	- 4 27 39.94
11	98 B. Draconis	E W	3 ...	16 20 9.0 16 25 4.5	2 28.3 2 27.2	52.15 52.10	51.45 50.70	..... .....	343 29 44.18 16 29 35.15	+ 2.52 + 2.12	+18.65 -18.37	- 16.95 + 16.97	+55 25 10.30
12	35 B. Camelop. s. p.	W E	3 ...	16 33 32.0 16 38 56.0	2 42.2 2 41.8	51.55 51.15	50.10 49.90	..... .....	65 16 7.18 294 43 16.32	+ 1.46 + 1.17	+ 3.03 - 3.01	+2 3.87 -2 3.92	+75 46 10.95
13	κ Ophiuchi	E W	3 ...	16 50 39.0 16 56 2.0	2 47.4 2 35.6	52.35 52.85	51.10 51.55	..... .....	29 23 28.72 330 35 55.50	+ 2.40 + 2.89	-23.89 +20.64	+ 32.29 - 32.30	+ 9 31 20.16
14	19 H. Camelop. s. p.	W E	4 ...	17 4 20.0 17 9 30.0	2 44.4 2 25.6	52.35 51.45	50.90 50.00	..... .....	61 55 7.50 298 4 14.92	+ 2.29 + 1.39	+ 2.45 - 1.92	+1 47.21 -1 47.26	+79 7 27.28
15	74 B. Camelop. s. p.	E W	4 ...	17 24 26.0 17 30 4.0	2 47.3 2 50.7	52.00 53.50	50.50 52.15	..... .....	293 56 8.32 66 3 13.05	+ 1.92 + 3.52	- 3.37 + 3.50	-2 8.71 +2 8.75	+74 58 58.11
16	324 B. Herculis	W E	3 ...	17 38 .....	... ...	52.75 51.70	51.15 49.80	27.577 27.577	4 33 27.95 355 22 17.75	+ 1.91 + 0.66	- 0.32 + 0.32	+ 4.62 - 4.62	+43 30 56.58
17	35 Draconis	E W	3.5 ...	17 51 17.0 17 56 48.0	2 43.2 2 47.8	52.20 54.00	50.65 52.35	..... .....	321 57 13.58 38 2 7.48	+ 2.09 + 3.90	+ 4.13 - 4.37	- 44.96 + 44.97	+76 58 25.13
18	24 Ursæ Minoris	W E	4 ...	18 3 32.0 18 8 58.0	2 51.9 2 34.1	53.30 51.90	51.70 50.35	..... .....	48 2 53.80 311 56 27.25	+ 3.19 + 1.78	- 0.88 + 0.71	+1 3.96 -1 3.99	+86 59 33.72
19	109 Herculis	E W	3 ...	18 17 9.0 18 22 38.5	2 45.9 2 43.6	51.95 53.60	50.25 52.10	..... .....	17 11 44.70 342 47 36.48	+ 1.77 + 3.56	-36.69 +35.69	+ 17.83 - 17.83	+21 43 31.70
20	156 H ¹ . Draconis	W E	3 ...	18 31 32.0 18 37 25.0	3 6.5 2 46.5	53.15 51.85	51.45 50.05	..... .....	38 31 57.52 321 27 24.38	+ 2.99 + 1.62	- 5.14 + 4.10	+ 45.88 - 45.88	+77 28 15.08

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
24 17 30	52.3	...	...	1. Instrument in meridian, observation at I with movable thread.					1	389 59 42.34	+6.69
17 53	51.6	...	...	6, 8, 16. Instrument in meridian, observation at IX with movable thread.					2	41.04	-3.11
18 4	51.7	53.4	29.894						3	41.50	+2.80
18 19	51.6	...	...						4	41.04	+9.36
18 35	51.6	52.7	29.894						5	42.33	...
30 15 13	50.3	57.6	29.786						6	42.42	+2.27
15 27	55.9	...	...						7	42.88	...
15 37	55.9	...	...						8	42.68	...
15 47	55.9	...	...						9	42.82	...
16 0	55.3	56.3	29.786						10	41.68	...
16 14	54.6	...	...						11	42.14	+3.57
16 23	53.9	...	...						12	43.05	...
16 37	52.9	...	...						13	43.12	...
16 54	53.2	54.3	29.798						14	43.29	...
17 7	52.5	...	...	Notes.					15	43.49	...
17 28	52.1	...	...	7, 9, 13, 14. Clouds.					16	44.58	+5.48
17 36	51.9	53.6	29.804	13 E. One microscope reading decreased 10".					17	43.41	...
17 54	52.2	...	...						18	42.91	+6.56
18 7	51.5	...	...						19	42.76	...
18 20	51.1	...	...						20	42.74	+8.36
18 35	51.1	52.5	29.814								

No.	Date, observer, and object.	Cir- cle	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
	May 2. L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1 6	B. Ursæ Minoris	E	2	12 11 52.0	3 1.0	52.45	52.00	.....	310 42 17.20	+ 1.60	+ 0.57	-1 5.57	+88 13 43.43
		W	...	12 17 20.0	2 27.0	52.90	52.50	.....	49 17 0.28	+ 2.05	- 0.37	+1 5.57	
2 β	Corvi	W	3	12 26 47.0	2 53.2	52.15	51.75	.....	208 13 26.82	+ 1.29	+13.31	-1 44.81	-22 52 28.53
		E	...	12 32 13.0	2 32.8	51.65	51.15	.....	61 45 51.60	+ 0.74	-10.36	+1 44.82	
3 330	G. Hydræ	E	3	12 36 36.0	2 37.2	51.95	51.65	.....	66 41 17.30	+ 1.13	-10.10	+2 10.39	-27 48 21.10
		W	...	12 41 57.0	2 43.8	52.65	52.10	.....	293 18 1.10	+ 1.74	+10.96	-2 10.42	
4 1	B. Ursæ Minoris s. p.	W	3	12 54 14.0	2 35.8	52.10	51.70	.....	52 32 24.58	+ 1.21	+ 0.34	+1 13.67	+88 30 44.94
		E	...	13 0 0.0	3 10.2	51.10	50.45	.....	307 26 56.92	+ 0.07	- 0.50	-1 13.67	
5 σ	Virginis	E	2.5	13 10 57.5	2 7.2	51.70	51.00	.....	32 56 25.65	+ 0.66	-12.55	+ 36.62	+ 5 58 8.00
		W	...	13 15 35.0	2 30.3	52.75	52.05	.....	327 2 50.60	+ 1.73	+17.53	- 36.62	
6 α	Ursæ Minoris s. p.	W	3	13 22 6.0	2 22.6	52.30	51.60	.....	52 15 17.05	+ 1.29	+ 0.23	+1 12.06	+88 47 54.01
		E	...	13 27 26.0	2 57.4	51.30	50.45	.....	307 44 5.82	+ 0.21	- 0.35	-1 13.00	
7 γ	Libræ	E	3	15 27 37.0	2 52.3	50.00	50.50	.....	53 22 16.65	+ 1.83	-15.20	+1 15.75	-14 28 22.70
		W	...	15 33 8.0	2 38.7	50.05	50.70	.....	306 37 1.40	+ 1.95	+12.89	+ 15.77	
8 α	Serpentis	W	3	15 37 2.0	2 49.7	49.85	50.35	.....	327 48 1.45	+ 1.66	+22.78	- 35.51	+ 6 43 26.12
		E	...	15 42 34.0	2 42.3	49.15	49.60	.....	32 11 15.70	+ 0.92	-20.84	+ 35.52	
9 δ	Scorpii	E	3.5	15 52 15.0	2 44.6	49.55	49.70	.....	61 14 28.80	+ 1.19	-12.13	+1 42.54	-22 21 4.20
		W	...	15 57 45.0	2 45.4	50.45	50.80	.....	298 44 47.00	+ 2.21	+12.24	-1 42.60	
10 c ¹	Scorpii	W	3.5	16 4 2.0	2 41.8	49.75	50.40	.....	293 25 35.55	+ 1.63	+10.72	-2 9.66	-27 40 45.12
		E	...	16 9 22.0	2 38.2	49.20	49.60	.....	66 33 41.25	+ 0.95	-10.25	+2 9.70	
11 ρ	Ophiuchi (s. star)	E	3.5	16 17 20.0	2 49.9	49.55	49.65	.....	62 7 0.85	+ 1.17	-12.73	+1 46.52	-23 13 40.02
		W	...	16 22 42.0	2 32.1	50.75	50.95	.....	297 52 16.60	+ 2.42	+10.20	-1 46.61	
12 τ	Scorpii	W	4	16 27 30.0	2 44.8	50.25	50.00	.....	293 5 20.02	+ 1.69	+11.06	-2 12.12	-28 1 4.04
		E	...	16 33 12.0	2 57.2	49.55	49.55	.....	66 54 1.38	+ 1.11	-12.78	+2 12.18	
13 114	B. Draconis	E	3	16 41 4.0	2 42.5	49.85	49.70	.....	341 57 52.05	+ 1.33	+19.74	- 18.45	+56 57 2.98
		W	...	16 46 33.0	2 46.5	51.00	51.00	.....	18 1 27.15	+ 2.59	-20.73	+ 18.45	
14 κ	Ophiuchi	W	3	16 50 47.0	2 39.6	50.30	50.10	.....	330 35 54.45	+ 1.77	+21.72	- 31.94	+ 9 31 21.88
		E	...	16 56 12.5	2 45.9	49.15	49.00	.....	29 23 26.28	+ 0.62	-23.46	+ 31.96	
15 10	H. Camelop. s. p.	E	3.5	17 4 38.0	2 26.2	49.10	48.90	.....	298 4 9.00	+ 0.53	- 1.94	-1 45.93	+79 7 24.99
		W	...	17 9 52.0	2 47.8	51.10	51.10	.....	61 55 7.25	+ 2.71	+ 2.55	+1 46.01	
16 β	Draconis	W	3	17 25 42.3	2 51.4	51.00	50.55	.....	13 26 51.62	+ 2.37	-32.71	+ 13.64	+52 22 12.30
		E	...	17 31 8.5	2 34.8	48.70	48.30	.....	346 32 30.38	+ 0.04	+26.69	- 13.64	
17 φ ¹	Draconis	E	3	17 41 15.0	2 40.3	49.05	48.55	.....	326 43 49.30	+ 0.35	+ 6.08	- 37.34	+72 11 38.98
		W	...	17 46 42.0	2 46.7	51.55	51.10	.....	33 15 29.50	+ 2.93	- 6.57	+ 37.34	
18 35	Draconis	W	3.5	17 51 10.0	2 50.6	51.25	50.80	.....	38 2 8.58	+ 2.61	- 4.52	+ 44.56	+76 58 27.43
		E	...	17 56 53.0	2 52.4	48.70	48.10	.....	321 57 9.58	- 0.06	+ 4.61	- 44.60	
19 24	Ursæ Minoris	E	3	18 3 30.0	2 55.8	48.70	48.10	.....	311 56 24.22	- 0.05	+ 0.92	-1 3.49	+86 59 35.36
		W	...	18 9 6.0	2 40.2	51.65	51.05	.....	48 2 53.48	+ 2.96	- 0.77	+1 3.50	
20 109	Hereulis	W	3.5	18 17 13.5	2 41.6	50.80	49.90	.....	342 47 37.62	+ 1.93	+34.82	- 17.68	+21 43 32.42
		E	...	18 22 46.0	2 50.9	48.90	47.90	.....	17 11 46.32	- 0.06	-38.94	+ 17.68	

Time	Ther- 35°	At- ther	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1900.
<i>t h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
12 15	61.3	63.7	29.844					1	359 59 40.66	
12 17	61.3							2	41.70	
12 19	60.9	63.2	29.842					3	41.05	+12.44
12 21	60.9							4	41.11	+ 8.83
12 23	60.9							5	41.81	+ 5.69
12 25	60.4	62.4	29.838					6	42.10	
12 27	60.9	62.0	29.843					7	39.75	
12 29	60.7							8	40.84	
12 31	60.3							9	39.62	
12 33	60.5							10	39.94	- 2.83
12 35	60.2	62.6	29.828					11	39.21	- 3.20
12 37	59.7							12	41.27	
12 39	59.5							13	41.06	
12 41	59.1							14	40.78	
12 43	58.5							15	40.09	
12 45	58.5	60.6	29.814	Note. 11. Assumed that south star was observed.				16	39.80	
12 47	58.2							17	40.80	
12 49	58.6							18	40.18	
12 51	58.1							19	40.18	+ 4.79
12 53	58.1		29.826					20	40.84	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	May 8, L. 10 Virginis	E W	3 ...	12 2 18.0 12 7 44.5	2 47.2 2 39.3	49.90 51.05	49.65 51.35	..... .....	36 28 49.28 323 30 30.35	+ 0.96 + 2.41	-19.93 +18.09	+ 41.51 - 41.51	+ 2 25 45.34
2	α^2 Centauri	W E	4 ...	12 18 14.0 12 22 42.0	2 23.8 2 4.2	49.60 49.25	49.45 49.10	..... .....	286 27 31.62 73 31 44.50	+ 0.71 + 0.35	+ 7.52 - 5.61	-3 7.60 +3 7.60	-34 39 50.72
3	β Corvi	E W	2.5 ...	12 26 51.0 12 32 52.0	2 49.1 3 11.9	49.10 50.30	48.60 49.95	..... .....	61 45 54.88 298 13 20.38	+ 0.02 + 1.33	-12.60 +16.34	+1 44.25 -1 44.30	-22 52 29.78
4	Groombridge 1922	W E	2.5 ...	12 41 ..... .....	..... .....	50.20 49.25	49.75 48.80	26.033 26.033	7 1 8.18 352 56 38.45	+ 0.44 - 0.54	- 0.35 + 0.35	+ 6.94 - 6.94	+45 57 38.52
5	1 B. Ursæ Minoris s. p.	E W	3 ...	12 54 42.0 13 4 26.0	2 11.0 7 33.0	49.20 51.20	48.85 50.95	..... .....	307 26 53.50 52 32 22.48	+ 0.19 + 2.28	- 0.24 + 2.84	-1 13.32 +1 13.35	+88 30 43.01
6	σ Virginis	W E	3 ...	13 10 35.5 13 15 32.5	2 29.1 2 27.9	50.65 49.35	50.25 48.70	..... .....	327 2 50.60 32 56 29.02	+ 1.65 + 0.19	+17.25 -16.97	- 36.48 + 36.48	+ 5 58 8.73
7	α Ursæ Minoris s. p.	E W	3 ...	13 22 30.0 13 27 50.0	2 1.9 3 18.1	49.35 51.20	48.80 51.00	..... .....	307 44 1.12 52 15 17.55	+ 0.25 + 2.32	- 0.17 + 0.44	-1 12.61 +1 12.61	+88 47 51.26
8	May 9, L. α Ursæ Minoris	W E	3.5 4	1 18 30.0 1 22 52.0	6 2.7 1 40.7	49.35 48.70	48.90 48.25	..... .....	49 51 2.18 310 8 9.62	+ 0.88 + 0.22	- 1.53 + 0.12	+1 6.97 -1 6.96	+88 47 49.33
9	α Ursæ Minoris	E W	4 3.5	1 27 26.0 1 31 20.0	2 53.3 6 47.3	48.85 49.85	48.30 49.55	..... .....	310 8 11.18 49 51 2.58	+ 0.33 + 1.46	+ 0.35 - 1.93	-1 6.94 +1 6.91	+88 47 48.63
10	May 12, L. 10 Virginis	W E	2.5 ...	12 2 33.0 12 7 42.0	2 32.2 2 36.8	50.45 49.80	50.25 49.55	..... .....	323 30 32.75 36 28 49.15	+ 1.15 + 0.47	+16.52 -17.53	- 40.61 + 40.62	+ 2 25 45.13
11	23 Comæ Berenices	E W	3 ...	12 27 36.0 12 33 12.5	2 47.1 2 49.4	50.20 52.20	49.95 51.70	..... .....	15 46 12.05 344 13 1.95	+ 0.87 + 2.80	-40.08 +41.18	+ 15.55 - 15.55	+23 9 7.58
12	d^2 Virginis	W E	2.5 ...	12 38 22.0 12 43 53.0	2 43.2 2 47.8	51.35 50.60	50.95 50.00	..... .....	329 16 2.32 30 43 18.08	+ 1.09 + 1.11	+21.89 -23.14	- 32.70 + 32.70	+ 8 11 28.96
13	1 B. Ursæ Minoris s. p.	E W	2 3	12 54 20.0 13 0 6.0	2 34.9 3 11.1	50.50 52.85	49.85 52.10	..... .....	307 26 49.88 52 32 26.15	+ 0.98 + 3.33	- 0.33 + 0.51	-1 11.78 +1 11.75	+88 30 41.92
14	20 Canum Venat.	W E	...	13 13 ..... .....	..... .....	52.30 50.40	51.55 49.65	25.413 25.413	2 8 21.88 357 50 12.10	+ 2.04 + 0.11	- 0.29 + 0.29	+ 2.06 - 2.07	+41 4 24.21
15	38 Cassiopeiæ s. p.	E W	4 ...	13 21 42.0 13 27 8.0	2 40.6 2 45.4	50.40 52.55	49.60 52.25	..... .....	288 44 2.40 71 15 14.00	+ 0.82 + 3.26	- 3.99 + 4.24	-2 40.40 +2 40.41	+69 46 21.88
16	δ Centauri	W E	4 ...	13 37 46.0 13 43 10.0	2 46.3 2 37.7	51.50 50.30	50.55 49.45	..... .....	288 32 54.58 71 26 21.15	+ 1.85 + 0.67	+10.43 - 9.38	-2 42.20 +2 42.24	-32 33 58.43
17	α Ursæ Minoris	E W	4.5 ...	1 17 26.0 1 22 40.0	7 8.2 1 54.2	51.65 50.10	50.85 49.45	..... .....	310 8 5.78 49 51 1.68	+ 1.66 + 0.14	+ 2.13 - 0.15	-1 5.52 +1 5.48	+88 47 48.14
18	α Ursæ Minoris	W E	4 ...	1 26 30.0 1 31 50.0	1 55.8 7 15.8	50.05 51.95	49.50 51.15	..... .....	49 51 1.00 310 8 4.18	+ 0.14 + 1.97	- 0.16 + 2.20	+1 5.45 -1 5.40	+88 47 48.78
19	May 18, L. σ Leonis	E W	3 ...	11 48 25.0 11 53 38.5	2 38.1 2 35.4	50.35 49.75	51.00 50.65	..... .....	22 44 26.80 337 14 46.60	+ 1.72 + 1.23	-26.34 +25.44	+ 23.57 - 23.59	+16 10 28.56
20	1 Canum Venat.	W E	3 ...	12 7 40.0 12 12 55.0	2 36.8 2 38.2	48.80 48.95	49.75 50.10	..... .....	15 2 24.38 344 56 50.45	+ 0.29 + 0.53	-23.64 +24.06	+ 15.14 - 15.15	+53 57 54.74

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
8 12 5	62.3	64.4	29.734	4, 14. Instrument in meridian, observation at IX with movable thread.					1	359 59 40.58	+ 8.34
12 25	62.1	...	...	8, 9, 17, 18. Instrument in meridian, observation between fixed thread and movable at 25.100 rev.					2	39.54	+15.35
12 30	61.8	...	...						3	40.10	...
12 57	61.2	...	...						4	40.68	- 3.23
13 13	60.6	...	...						5	40.54	+10.28
13 26	60.6	62.8	29.706						6	40.87	- 5.17
9 1 16	62.2	63.2	29.938						7	40.76	...
1 36	62.9	63.7	29.936						8	40.40	...
12 12 5	74.2	75.7	29.786						9	41.62	...
12 30	73.6	...	...						10	41.26	+ 8.13
12 41	73.5	...	...						11	39.38	...
12 57	73.2	74.9	29.794						12	41.12	+ 6.40
13 11	74.1	...	...						13	40.24	+11.11
13 24	74.2	...	...						14	40.15	...
13 40	73.8	75.3	29.803						15	40.37	...
1 16	73.3	74.4	29.950						16	39.07	+ 9.38
1 35	74.6	75.0	29.954						17	40.25	...
18 11 51	59.6	61.3	29.606						18	39.70	...
12 11	58.9	...	...						19	37.72	+ 1.82
									20	38.03	+ 7.22

Notes.
3, 5, 6, 20. Clouds.
8. Faint.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α^2 Centauri	E	3.5	12 17 52.0	2 45.6	49.70	50.85	.....	73 31 46.78	+ 1.32	- 9.98	+3 8.10	-34 39 51.66
	May 19. L.	W	...	12 22 6.0	1 28.4	49.80	50.80	.....	286 27 33.62	+ 1.34	+ 2.84	-3 8.10	
2	4 H. Draconis	W	3	12 5 25.0	2 36.2	49.20	50.55	.....	39 12 29.35	+ 0.85	- 3.36	+ 45.75	+78 8 50.65
		E	...	12 10 44.0	2 42.8	49.55	51.00	.....	320 46 45.35	+ 1.25	+ 3.65	- 45.76	
3	323 G. Hydræ	E	3.5	12 19 30.0	2 37.5	49.80	51.35	.....	71 10 47.35	+ 1.56	- 9.40	+2 43.26	-32 18 28.46
		W	...	12 24 12.0	2 4.5	50.30	51.50	.....	288 48 28.20	+ 1.89	+ 5.87	-2 43.32	
4	23 Comæ Berenices	W	2.5	12 27 39.0	2 43.9	49.50	50.65	.....	344 13 7.05	+ 1.06	+38.56	- 15.89	+23 9 8.51
		E	...	12 33 4.3	2 41.4	49.35	50.90	.....	15 46 7.35	+ 1.10	-37.38	+ 15.89	
5	Groombridge 1922	E	2.5	12 41 ....	.....	49.60	50.75	27.960	352 55 13.50	+ 1.89	+ 0.35	- 6.95	+45 57 39.81
		W	...	.....	.....	50.20	51.25	27.960	6 59 46.15	+ 2.46	- 0.35	+ 6.95	
6	α Ursæ Minoris S. P.	W	3	13 19 6.0	5 32.6	50.50	51.45	.....	52 15 17.92	+ 1.98	+ 1.25	+1 12.63	+88 47 48.84
		E	...	13 22 6.0	2 32.6	49.20	50.15	.....	307 43 56.90	+ 0.66	- 0.26	-1 12.63	
7	α Ursæ Minoris S. P.	E	3	13 25 12.0	0 33.4	49.20	50.15	.....	307 43 56.90	+ 0.66	- 0.01	-1 12.63	+88 47 49.78
		W	...	13 29 12.0	4 33.4	50.85	51.95	.....	52 15 16.28	+ 2.42	+ 0.84	+1 12.63	
8	ι Centauri	E	3.5	13 38 10.0	2 22.2	49.05	50.10	.....	71 26 14.40	+ 0.54	- 7.63	+2 46.07	-32 33 58.49
		W	...	13 42 58.0	2 25.8	50.15	51.20	.....	288 32 59.55	+ 1.67	+ 8.02	-2 46.04	
9	48 Hydræ	W	3	13 52 8.0	2 49.4	49.15	50.30	.....	296 33 4.78	+ 0.70	+12.38	-1 52.11	-24 32 55.96
		E	...	13 57 37.0	2 39.6	48.80	49.90	.....	63 26 9.40	+ 0.32	-10.99	+1 52.14	
10	2 Libræ	E	3	14 15 40.0	2 55.3	49.60	50.45	.....	50 10 56.55	+ 1.01	-16.65	+1 7.55	-11 16 52.97
		W	...	14 21 15.0	2 39.7	50.20	51.35	.....	309 48 21.32	+ 1.77	+13.81	-1 7.58	
11	σ Boötis	W	3	14 30 ....	.....	49.75	50.55	26.151	351 13 7.68	+ 0.41	- 0.19	- 8.70	+30 9 29.56
		E	...	.....	.....	49.00	50.00	26.151	8 44 24.65	- 0.27	+ 0.19	+ 8.70	
12	34 Boötis	E	3	14 36 43.7	2 47.4	49.05	49.85	.....	11 59 38.05	+ 0.43	-51.00	+ 12.01	+26 55 55.38
		W	...	14 42 17.5	2 46.4	50.35	51.25	.....	347 59 36.85	+ 1.81	+50.41	- 12.01	
13	ξ^1 Libræ	W	3	14 46 52.0	2 37.9	49.80	50.60	.....	309 34 34.28	+ 1.18	+13.45	-1 8.22	-11 30 41.86
		E	...	14 52 14.5	2 44.6	49.20	50.20	.....	50 24 43.35	+ 0.67	-14.62	+1 8.20	
14	α Ursæ Minoris	E	3	1 18 28.0	6 11.0	48.70	49.80	.....	310 8 13.52	+ 0.14	+ 1.60	-1 6.59	+88 47 46.81
		W	...	1 22 52.0	1 47.0	50.25	51.75	.....	49 51 0.65	+ 1.92	- 0.13	+1 6.65	
15	α Ursæ Minoris	W	3	1 26 54.0	2 15.0	50.00	51.10	.....	49 51 0.88	+ 1.47	- 0.21	+1 6.71	+88 47 47.14
		E	...	1 31 10.0	6 31.0	.....	.....	.....	310 8 13.08	- 0.33	+ 1.78	-1 6.77	
16	May 20. L.												
17	323 G. Hydræ	W	2.5	12 18 38.0	3 29.5	48.85	50.45	.....	288 48 21.85	+ 0.99	+16.63	-2 44.75	-32 18 27.93
		E	3	12 24 48.0	2 40.5	49.90	51.30	.....	71 10 46.62	+ 1.97	- 9.76	+2 44.95	
18	319 B. Cephei S. P.	E	3	12 29 46.0	3 1.8	49.25	50.90	.....	300 54 29.10	+ 1.43	- 2.29	-1 34.56	+81 57 57.64
		W	...	12 35 32.0	2 44.2	50.75	52.20	.....	59 4 45.82	+ 2.87	+ 1.87	+1 34.63	
19	d^2 Virginis	W	2.5	12 38 40.0	2 25.0	50.10	51.55	.....	329 16 6.95	+ 2.21	+17.28	- 33.78	+ 8 11 29.95
		E	...	12 43 20.5	2 15.5	48.95	50.30	.....	30 43 6.28	+ 0.99	-15.09	+ 33.78	
20	20 Canum Venat.	E	3	13 13 ....	.....	48.60	49.75	25.304	357 50 11.70	+ 1.26	+ 0.29	- 2.14	+41 4 25.68
		W	...	.....	.....	50.50	51.85	25.304	2 8 24.15	+ 3.28	- 0.29	+ 2.14	
21	α Ursæ Minoris S. P.	W	3.5	13 18 36.0	6 3.4	50.70	52.00	.....	52 15 15.58	+ 2.75	+ 1.49	+1 13.66	+88 47 49.23
		E	...	13 22 56.0	1 43.4	48.50	49.60	.....	307 43 58.55	+ 0.41	- 0.12	-1 13.70	

Time.	Ther. 5892	Att. ther	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>								
15 12 21	68.9			Instrument in meridian, observation at I with movable thread.					1	189 59 37.96	+16.24
15 12 36	68.9	60.6	29.611	Instrument in meridian, observation at IX with movable thread.					2	38 54	
15 13 08	69.5	62.0	29.584						3	37.70	+15.78
15 13 29	69.9								4	38.87	
15 13 50	69.6								5	38.10	- 5.47
15 14 12	69.6								6	39 22	
15 14 33	69.3	61.4	29.609						7	38.54	
15 14 55	69.6								8	38.29	+10.02
15 15 16	69.6								9	38.41	
15 15 38	69.4	61.3	29.612						10	38.89	+ 4.46
15 15 59	69.4								11	38.46	- 2.20
15 16 21	69.9								12	38.28	- 1.73
15 16 43	69.6	60.7	29.608						13	39 14	+ 2.71
15 17 05	69.7								14	38.88	
1 17	69.1	60.8	29.645	Notes					15	38.40	
1 19	69.5	60.3	29.606	1 Clouds					16	39 25	+13.88
20 12 27	69.1	60.7	29.581	15 E. Level correction assumed					17	39 44	+13.43
15 33	69.1								18	39 31	+ 4.61
15 34	69.9								19	37.84	
15 35	69.2	60.6	29.587						20	39 31	

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P. May 21, L.	E W	3.5 ...	13 26 40.0 13 31 20.0	2 0.6 6 40.6	48.10 51.05	49.25 52.20	..... .....	307 43 58.52 52 15 15.40	+ 0.02 + 3.03	- 0.16 + 1.81	-1 13.67 +1 13.60	+88 47 48.84
2	α Ursæ Minoris	E W	3 ...	1 18 18.0 1 22 52.0	6 22.5 1 48.5	49.85 49.05	51.30 50.50	..... .....	310 8 12.42 49 51 1.35	+ 1.44 + 0.61	+ 1.70 - 0.14	-1 6.24 +1 6.21	+88 47 45.96
3	α Ursæ Minoris May 22, L.	W E	3 ...	1 26 52.0 1 31 34.0	2 11.5 6 53.5	48.80 49.90	50.05 51.35	..... .....	49 51 2.00 310 8 11.42	+ 0.26 + 1.50	- 0.20 + 1.99	+1 6.16 -1 6.13	+88 47 46.32
4	6 Canum Venat.	E W	2.5 ...	12 21 ..... .....	..... .....	49.00 49.35	50.10 50.55	27.475 27.475	359 20 19.22 0 35 21.92	+ 2.06 + 2.49	+ 0.28 - 0.28	- 0.61 + 0.61	+39 32 48.50
5	319 B. Cephei S. P.	W E	3.5 ...	12 20 22.0 12 35 52.0	3 26.1 3 3.9	49.25 49.05	50.10 50.00	..... .....	59 4 47.22 300 54 26.98	+ 1.47 + 1.31	+ 2.94 - 2.34	+1 32.91 -1 32.95	+81 57 57.63
6	d^2 Virginis	E W	2.5 ...	12 39 20.5 12 42 29.0	1 44.5 1 24.0	49.20 50.25	50.15 51.05	..... .....	30 43 0.52 329 16 17.75	+ 1.48 + 2.50	- 8.98 + 5.80	+ 33.18 - 33.19	+ 8 11 29.93
7	19 Canum Venat.	E W	3 ...	13 11 ..... .....	..... .....	48.60 49.40	49.20 49.95	27.982 27.982	357 31 19.38 2 23 39.78	+ 1.27 + 2.08	+ 0.19 - 0.19	- 2.38 + 2.38	+41 21 29.40
8	α Ursæ Minoris S. P.	W E	2.5 ...	13 18 26.0 13 22 40.0	6 14.9 2 0.9	49.45 48.60	50.00 49.20	..... .....	52 15 18.38 307 43 56.18	+ 1.54 + 0.70	+ 1.58 - 0.16	+1 12.21 -1 12.23	+88 47 48.79
9	α Ursæ Minoris S. P.	E W	2.5 ...	13 27 4.0 13 31 10.0	2 23.1 6 29.1	48.30 49.65	49.05 50.40	..... .....	307 43 56.70 52 15 17.42	+ 0.48 + 1.84	- 0.23 + 1.71	-1 12.24 +1 12.26	+88 47 49.14
10	σ Boötis	E W	2.5 ...	14 30 ..... .....	..... .....	48.85 49.20	48.95 49.05	26.097 26.097	8 44 24.32 351 13 8.85	+ 1.41 + 1.67	+ 0.19 - 0.19	+ 8.64 - 8.64	+30 9 30.16
11	34 Boötis	W E	3 ...	14 37 2.0 14 41 43.7	2 29.1 2 12.6	48.10 48.80	48.30 48.75	..... .....	347 59 50.02 11 59 19.68	- 0.01 + 0.58	+40.49 -32.01	- 11.90 + 11.90	+26 55 55.82
12	ξ^1 Libræ	E W	2.5 ...	14 47 12.0 14 51 42.0	2 17.9 2 12.1	49.15 49.30	49.00 49.35	..... .....	50 24 38.08 309 34 37.88	+ 0.86 + 1.12	-10.26 + 9.41	+1 7.69 -1 7.72	-11 30 41.69
13	α Ursæ Minoris	E W	4 ...	1 18 14.0 1 22 50.0	6 27.2 1 51.2	49.00 48.95	48.70 48.70	..... .....	310 8 8.02 49 50 57.20	+ 0.53 + 0.48	+ 1.75 - 0.14	-1 6.94 +1 6.91	+88 47 47.15
14	α Ursæ Minoris May 23, L.	W E	4 ...	1 27 20.0 1 31 18.0	2 38.8 6 36.8	48.95 48.65	48.70 48.50	..... .....	49 50 56.38 310 8 8.95	+ 0.48 + 0.25	- 0.20 + 1.83	+1 6.88 -1 6.85	+88 47 46.25
15	α Ursæ Minoris	W E	3 ...	1 18 44.0 1 22 50.0	5 57.9 1 51.9	48.25 49.05	48.05 48.90	..... .....	49 51 2.35 310 8 16.25	+ 0.32 + 1.18	- 1.49 + 0.15	+1 7.34 -1 7.31	+88 47 45.73
16	α Ursæ Minoris May 24, L.	E W	3.5 ...	1 27 0.0 1 31 40.0	2 18.1 6 58.1	49.10 48.45	48.70 48.00	..... .....	310 8 16.85 49 51 3.18	+ 1.10 + 0.39	+ 0.22 - 2.03	-1 7.30 +1 7.31	+88 47 45.60
17	6 Canum Venat.	W E	3 ...	12 21 ..... .....	..... .....	50.80 49.90	50.05 49.00	27.574 27.574	0 35 20.00 359 20 17.45	+ 1.51 + 0.49	- 0.28 + 0.28	+ 0.62 - 0.62	+39 32 48.73
18	24 Comæ Berenices	E W	3 ...	12 27 52.5 12 33 14.0	2 45.2 2 36.3	49.90 51.60	48.95 50.85	..... .....	20 1 7.85 339 58 11.50	+ 1.21 + 3.07	-31.99 +28.64	+ 20.66 - 20.67	+18 53 59.01
19	32 ² H. Camelop.	W E	3.5 ...	12 46 2.0 12 51 36.0	2 40.1 2 53.9	51.55 49.70	50.30 48.45	..... .....	44 59 21.68 314 59 53.78	+ 2.76 + 0.87	- 1.63 + 1.91	+ 56.74 - 56.75	+83 55 56.48

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
20 13 29	55.9	.....	.....	4.10.	Instrument in meridian, observation at I with movable thread.				1	359 59 39.28	.....
13 40	57.0	58.0	29.835	7.	Instrument in meridian, observation at II with movable thread.				2	38.68	.....
21 1 17	66.6	66.3	29.804	13, 14.	Instrument in meridian, observation between fixed thread and movable at 25.100 rev.				3	38.50	.....
1 34	67.4	67.4	29.800	17.	Instrument in meridian, observation at IX with movable thread.				4	39.14	+ 4.14
22 12 20	65.6	67.4	29.724						5	38.77	+ 13.65
12 32	65.2	.....	.....						6	39.53	+ 4.49
12 45	64.6	.....	.....						7	38.26	+ 4.90
13 9	63.6	.....	.....						8	39.10	.....
13 17	63.6	65.9	29.715						9	38.97	.....
13 41	62.9	.....	.....						10	38.14	- 2.75
14 29	62.9	.....	.....						11	39.38	+ 2.28
14 40	63.2	.....	.....						12	38.98	+ 2.73
14 54	62.6	64.2	29.698						13	38.50	.....
1 19	60.6	.....	.....						14	38.46	.....
1 32	61.3	62.3	29.818						15	39.40	.....
23 1 18	61.2	62.0	30.040						16	39.86	.....
1 26	61.7	.....	.....						17	40.06	- 4.41
1 34	61.6	62.4	30.046						18	40.14	.....
24 12 20	62.2	66.1	29.956						19	39.68	.....
12 30	61.3	.....	.....						
12 49	60.3	.....	.....						

Notes.
8. Clouds.
13. Very faint.

No	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P.	W	3.5	13 19 20.0	5 22.2	51.85	50.45	.....	52 15 17.55	+ 2.99	+ 1.17	+ 1 13.45	+88 47 48.83
		E	...	13 23 50.0	0 40.2	49.90	48.10	.....	507 43 58.75	+ 0.79	- 0.02	- 1 13.47	
2	81 Ursæ Majoris	E	3	13 28 5.0	2 39.3	49.85	48.15	.....	343 4 38.65	+ 0.78	+ 20.78	- 17.33	+55 50 13.73
		W	...	13 33 24.0	2 39.7	52.05	50.55	.....	16 54 37.55	+ 3.13	- 20.88	+ 17.33	
3	48 Hydræ	E	4	13 52 28.0	2 29.4	49.80	47.85	.....	63 26 8.08	+ 0.63	- 9.63	+ 1 53.70	-24 32 55.70
		W	...	13 57 26.0	2 28.6	51.85	50.05	.....	296 33 9.40	+ 2.78	+ 9.53	- 1 53.73	
4	2 Libræ	W	3	14 15 49.0	2 46.3	50.25	48.60	.....	309 48 23.30	+ 1.20	+ 14.98	- 1 8.50	-11 16 52.60
		E	...	14 21 19.0	2 43.7	48.95	47.35	.....	50 10 55.50	- 0.12	- 14.51	+ 1 8.53	
5	μ Virginis	E	3	14 55 29.0	2 50.6	50.05	48.35	.....	44 9 2.58	+ 0.99	- 17.65	+ 55.56	- 5 14 45.70
		W	...	14 40 46.0	2 26.4	51.35	49.50	.....	315 50 17.18	+ 2.26	+ 13.00	- 55.58	
6	ξ Boötis	W	3	14 44 39.5	2 37.3	50.75	48.85	.....	340 33 58.30	+ 1.61	+ 29.76	- 20.21	+19 29 44.71
	June 1, L.	E	...	14 50 3.5	2 46.7	49.35	47.45	.....	19 25 26.28	+ 0.17	- 33.41	+ 20.21	
7	5 B. Ursæ Minoris	W	2.5	12 12 6.0	2 12.8	49.75	49.55	.....	48 1 22.60	+ 0.69	- 0.53	+ 1 2.49	+86 58 2.75
		E	...	12 16 28.0	2 9.2	51.15	51.20	.....	311 57 52.78	+ 2.26	+ 0.50	- 1 2.53	
8	24 Comæ Berenices	W	3	12 27 35.0	3 2.6	49.50	49.00	.....	339 58 4.42	+ 0.30	+ 39.08	- 20.56	+18 53 59.13
		E	3.5	12 33 13.0	2 35.4	51.40	51.15	.....	20 1 3.65	+ 2.34	- 28.31	+ 20.57	
9	32 ² H. Camelop.	E	3	12 46 26.0	2 14.8	51.20	50.65	.....	314 59 51.45	+ 2.01	+ 1.15	- 56.40	+83 55 57.95
		W	...	12 50 55.0	2 14.2	52.65	51.85	.....	44 39 22.20	+ 3.35	- 1.14	+ 56.43	
10	α Ursæ Minoris S. P.	E	3	13 20 0.0	4 48.5	50.25	49.00	.....	307 43 57.60	+ 0.68	- 0.94	- 1 12.08	+88 47 48.07
		W	...	13 24 30.0	0 18.5	52.65	51.75	.....	52 15 18.65	+ 3.30	0.00	+ 1 13.00	
11	81 Ursæ Majoris	W	3	13 28 16.0	2 28.1	52.60	51.65	.....	16 54 35.02	+ 3.21	- 17.96	+ 17.21	+55 50 15.05
		E	...	13 33 16.0	2 31.9	50.20	48.90	.....	343 4 38.40	+ 0.58	+ 18.89	- 17.22	
12	47 Hydræ	W	3	13 50 35.0	2 52.8	52.20	51.00	.....	296 35 22.58	+ 2.69	+ 12.89	- 1 52.77	-24 30 38.05
		E	...	13 56 14.0	2 46.2	50.40	49.00	.....	63 23 53.10	+ 0.76	- 11.92	+ 1 52.82	
13	μ Virginis	W	3	14 35 28.0	2 51.6	51.65	49.90	.....	315 50 13.32	+ 1.87	+ 17.86	- 55.17	- 5 14 44.85
		E	...	14 40 58.0	2 38.4	50.45	48.85	.....	44 9 0.18	+ 0.70	- 15.22	+ 55.17	
14	ξ Boötis	E	2.5	14 44 40.5	2 36.3	50.55	49.00	.....	19 25 17.58	+ 0.83	- 29.37	+ 20.06	+19 29 46.44
	June 2, L.	W	...	14 50 1.7	2 44.9	52.60	51.15	.....	340 33 53.08	+ 2.99	+ 32.70	- 20.05	
15	7 Virginis (mean)	W	3	12 34 20.0	2 46.6	49.50	49.00	.....	320 9 4.35	+ 0.43	+ 18.38	- 46.74	- 0 55 48.35
		E	...	12 39 48.5	2 41.9	51.20	50.50	.....	39 50 14.90	+ 2.07	- 17.35	+ 46.77	
16	α Ursæ Minoris S. P.	E	3	13 22 20.0	2 29.4	51.70	50.50	.....	307 43 54.10	+ 2.33	- 0.25	- 1 12.71	+88 47 47.28
		W	...	13 27 30.0	2 40.6	52.20	51.00	.....	52 15 19.78	+ 2.84	+ 0.29	+ 1 12.74	
17	47 Hydræ	E	3.5	13 50 48.0	2 39.7	51.20	49.85	.....	63 23 52.15	+ 1.74	- 11.01	+ 1 52.25	-24 30 38.47
		W	...	13 56 10.0	2 42.3	51.50	49.75	.....	296 35 23.95	+ 1.84	+ 11.37	- 1 52.23	
18	9 H Boötis	W	3	14 4 ....	.....	50.70	48.95	25.284	5 22 30.92	+ 0.30	- 0.33	+ 5.32	+ 44 18 29.33
		E	...	.....	.....	50.35	48.95	25.284	354 36 15.68	+ 0.11	+ 0.33	- 5.32	
19	7 Boötis	E	3	14 28 .....	.....	52.00	50.20	28.016	0 9 12.78	+ 3.06	+ 0.27	+ 0.19	+38 43 31.68
		W	...	.....	.....	51.85	49.95	28.016	359 45 44.00	- 2.86	- 0.27	0.19	

Time	Ther. 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>s</i>	<i>°</i>	<i>mm</i>				
24 13 17	59.1	61.4	29.954	18. Instrument in meridian, observation at IX with movable thread.	1	359 59 40.60	- 8.25
13 11	58.9			19. Instrument in meridian, observation at I with movable thread.	2	40.00	
13 55	57.9				3	40.18	
14 6		59.8	29.962		4	40.19	+ 4.50
14 19	57.2				5	39.17	
14 18	56.2				6	41.36	- 1.54
14 47	56.2	58.7	29.962		7	39.13	- 14.34
14 15	56.8	61.4	29.836		8	40.74	
14 09	61.6				9	39.52	
14 51	61.2				10	39.66	
14 1	60.9	62.7	29.836		11	39.66	- 10.12
14 11	60.2				12	40.08	+ 8.47
14 11	60.2				13	39.36	
14 51	59.0				14	38.91	- 1.10
14 5		60.7	29.836		15	41.40	
14 18	57.7				16	39.56	
14 47	57.9	59.4	29.831		17	40.03	+ 8.40
14 17	54.2	67.3	29.794		18	40.12	- 7.99
14 16	61.9				19	39.74	
14 09	61.2						
14 41	60.5	62.7	29.799				
14 14	61.0						
14 16	60.9						

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	109 Virginis	W E	3 ...	14 38 47.5 14 44 19.0	2 55.5 2 36.0	50.15 50.25	48.60 48.95	..... .....	323 22 19.00 36 36 56.58	+ 0.57 + 0.79	+21.89 -17.30	- 41.95 + 41.95	+ 2 17 35.37
2	α Ursæ Minoris	W E	3.5 ...	1 22 20.0 1 27 45.0	2 29.9 2 55.1	51.00 49.65	49.35 47.70	..... .....	49 50 58.42 310 8 19.20	+ 1.62 + 0.10	- 0.26 + 0.36	+1 7.11 -1 7.04	+88 47 43.77
3	June 3, L. α Ursæ Minoris S. P.	W E	2.5 ...	13 18 15.0 13 22 30.0	6 35.3 2 20.3	50.85 49.95	50.00 49.35	..... .....	52 15 19.92 397 43 55.65	+ 1.94 + 1.16	+ 1.76 - 0.22	+1 12.39 -1 12.44	+88 47 47.4
4	α Ursæ Minoris S. P.	E W	2.5 ...	13 26 55.0 13 31 44.0	2 4.7 6 53.7	49.80 51.45	49.20 50.55	..... .....	397 43 55.65 52 15 18.88	+ 1.00 + 2.53	- 0.17 + 1.93	-1 12.40 +1 12.54	+88 47 47.43
5	γ Boötis	W E	2.5 ...	14 28 ..... .....	..... .....	52.05 49.40	51.10 48.30	28.083 28.083	359 45 43.85 0 9 13.20	+ 2.40 - 0.40	- 0.27 + 0.27	- 0.19 + 0.19	+38 43 32.89
6	μ Libræ	E W	3 ...	14 41 52.0 14 47 2.0	2 31.0 2 39.0	51.10 53.00	50.00 51.95	..... .....	52 39 6.40 397 20 5.90	+ 2.07 + 4.06	-11.82 +13.10	+1 14.10 -1 14.08	-13 45 14.25
7	June 5, L. γ Scorpii	E W	3 ...	14 56 52.0 15 1 10.0	1 55.3 2 22.7	51.05 50.85	51.00 50.60	..... .....	63 47 43.58 296 11 27.02	+ 4.00 + 3.69	- 5.70 + 8.73	+1 49.99 -1 50.01	-24 54 34.58
8	γ Coronæ Borealis	W E	3 ...	15 37 34.0 15 41 52.5	1 27.5 2 51.0	47.60 49.80	47.60 49.85	..... .....	347 40 14.80 12 19 40.65	+ 0.52 + 2.78	+13.62 -51.95	- 11.90 + 11.92	+26 35 53.46
9	π Scorpii	E W	3 ...	15 50 36.0 15 56 8.0	2 47.1 2 44.9	50.25 49.85	50.00 49.45	..... .....	64 43 36.88 295 15 39.08	+ 3.08 + 2.60	-11.79 +11.48	+1 54.91 -1 54.94	-25 50 25.79
10	ρ Ophiuchi (mean)	W E	4 ...	16 17 54.0 16 22 47.0	2 16.1 2 36.9	47.70 49.55	46.95 49.05	..... .....	297 52 18.78 62 7 1.58	+ 0.24 + 2.21	+ 8.17 -10.86	-1 42.89 +1 42.94	-23 13 39.14
11	σ Herculis	E W	2.5 ...	16 31 ..... .....	..... .....	49.90 49.50	49.50 48.95	27.127 27.127	356 15 20.82 3 40 50.70	+ 3.21 + 2.70	+ 0.20 - 0.20	- 3.55 + 3.55	+42 38 4.68
12	δ Herculis	W E	2.5 ...	17 8 36.5 17 14 2.5	2 47.7 2 38.3	48.05 49.50	47.35 48.95	..... .....	346 1 1.55 13 58 12.38	+ 0.58 + 2.18	+44.81 -39.92	- 13.60 + 13.60	+24 57 9.19
13	ϵ Herculis	E W	2.5 ...	17 37 ..... .....	..... .....	50.35 51.40	49.70 50.55	26.547 26.547	352 50 22.85 7 6 31.80	+ 3.66 + 4.65	+ 0.35 - 0.35	- 6.84 + 6.84	+46 3 28.10
14	ν Ophiuchi	W E	3.5 ...	17 51 8.0 17 56 38.0	2 56.4 2 33.6	49.70 49.75	48.50 48.50	..... .....	311 19 29.62 48 39 42.38	+ 2.04 + 2.07	+17.33 -13.13	-1 1.97 +1 1.97	- 9 45 36.50
15	40 Draconis	E W	2.5 ...	18 4 58.0 18 9 38.0	2 32.1 2 7.9	50.05 50.85	48.90 49.55	..... .....	318 56 16.58 41 2 59.35	+ 2.45 + 3.15	+ 2.60 - 1.83	- 47.51 + 47.51	+79 59 23.67
16	μ Lyræ	W E	3.5 ...	18 21 ..... .....	..... .....	50.20 49.75	49.30 49.50	26.764 26.764	0 30 27.25 359 26 17.22	+ 1.93 + 1.28	- 0.28 + 0.28	+ 0.51 - 0.51	+39 27 22.21
17	α Ursæ Minoris	W E	3.5 ...	1 18 50.0 1 23 6.0	6 2.6 1 46.6	49.00 49.15	47.90 48.55	..... .....	49 51 4.08 310 8 14.72	- 0.14 + 0.31	- 1.53 + 0.13	+1 3.66 -1 3.64	+88 47 43.92
18	α Ursæ Minoris	E W	3.5 ...	1 26 54.0 1 31 36.0	2 1.4 6 43.4	49.85 49.50	49.25 48.80	..... .....	310 8 10.62 49 50 59.62	+ 1.02 + 0.57	+ 0.17 - 1.89	-1 3.59 +1 3.55	+88 47 43.46
19	June 8, L. α Ursæ Minoris S. P.	W E	2.5 ...	13 18 0.0 13 22 55.0	6 54.5 1 59.5	50.45 50.05	49.20 48.90	..... .....	52 15 21.30 397 43 54.00	+ 0.98 + 0.62	+ 1.04 - 0.16	+1 12.78 -1 12.74	+88 47 45.72

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
2 14 41	61.0	62.2	29.814	5.16. Instrument in meridian, observation at IX with movable thread.			1	359 59 40.76	.....
1 23	62.5	63.4	30.004	11. Instrument in meridian, observation at II with movable thread.			2	39.76	.....
1 28	63.1	.....	.....	13. Instrument in meridian, observation at I with movable thread.			3	40.08	.....
3 13 17	66.9	69.4	29.990	18. Instrument in meridian, observation between fixed thread and movable at 25.100 rev.			4	39.94	.....
13 35	65.5	.....	.....				5	40.66	.....
14 26	62.1	.....	.....				6	39.86	+3.02
14 44	62.2	63.8	29.968				7	40.65	.....
5 14 59	77.0	79.3	29.646				8	40.22	-5.58
15 40	75.7	.....	.....				9	40.65	-0.13
15 53	75.5	77.0	29.632				10	40.08	-2.30
16 20	74.1	.....	.....				11	40.80	.....
16 34	73.8	.....	.....				12	40.79	.....
17 2	.....	75.2	29.630				13	39.88	.....
17 11	74.5	.....	.....	Notes.			14	40.16	.....
17 34	74.5	75.9	29.626	7.8. Poor.			15	41.15	-3.24
17 54	74.8	.....	.....	12. Paint; clouds.			16	41.10	-3.43
18 7	74.8	.....	.....				17	38.80	.....
18 18	74.5	75.9	29.620				18	39.68	.....
1 19	82.6	80.4	29.630				19	39.36	.....
1 34	83.7	82.1	29.626						
8 13 17	62.7	64.6	29.887						

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoriss. P.	E W	2.5 ...	13 26 56.0 13 31 45.0	2 1.5 6 50.5	49.75 50.70	48.80 49.60	..... .....	307 43 54.18 52 15 20.95	+ 0.41 + 1.31	- 0.17 + 1.90	-1 12.73 +1 12.74	+88 47 45.76
2	6 B. Libræ	E W	3.5 ...	14 29 24.0 14 34 42.0	2 48.8 2 29.2	50.70 51.45	49.55 50.05	..... .....	50 48 8.52 309 11 10.18	+ 1.28 + 1.92	-15.26 +11.93	+1 9.42 -1 9.47	-11 54 8.06
3	γ Libræ	W E	3.5 ...	14 41 47.0 14 46 55.0	2 35.9 2 32.1	50.35 50.25	48.85 48.85	..... .....	307 20 8.88 52 39 6.38	+ 0.74 + 0.69	+12.60 -11.99	-1 14.30 +1 14.39	-13 45 14.14
4	α Ursæ Minoris	W E	3 ...	1 18 10.0 1 22 40.0	6 44.9 2 14.9	49.55 50.20	47.65 48.55	..... .....	49 51 0.90 310 8 19.38	- 0.06 + 0.74	- 1.91 + 0.21	+1 6.85 -1 6.83	+88 47 42.78
5	α Ursæ Minoris	E W	3 ...	1 26 55.0 1 31 25.0	2 0.1 6 30.1	50.35 50.15	48.85 48.65	..... .....	310 8 19.02 49 51 0.60	+ 0.96 + 0.75	+ 0.17 - 1.77	-1 6.83 +1 6.83	+88 47 43.18
6	June 9, L. 109 Virginis	E W	3 ...	14 38 59.0 14 44 23.0	2 43.9 2 40.1	52.00 50.80	50.80 49.70	..... .....	36 36 54.92 323 22 21.50	+ 3.11 + 1.93	-19.09 +18.22	+ 41.83 - 41.80	+ 2 17 36.15
7	γ Scorpii	W E	4 ...	14 56 2.0 15 1 40.0	2 45.1 2 52.9	49.10 50.85	47.85 49.80	..... .....	296 11 30.60 63 47 48.20	+ 0.12 + 2.03	+11.69 -12.82	-1 54.11 +1 54.19	-24 54 35.01
8	β Libræ	W E	3 ...	15 9 20.0 15 14 49.0	2 50.0 2 39.0	49.75 51.00	48.25 49.85	..... .....	312 3 13.48 47 56 3.25	+ 0.66 + 2.12	+16.31 -14.27	-1 2.53 +1 2.55	- 9 1 56.22
9	α Coronæ Borealis	E W	3 ...	15 28 20.3 15 33 24.5	2 35.8 2 28.4	51.95 51.70	50.90 50.20	..... .....	11 53 15.75 348 6 1.12	+ 3.14 + 2.67	-44.54 +40.41	+ 11.91 - 11.91	+27 2 9.66
10	α Ursæ Minoris	W E	3 ...	1 19 4.0 1 22 50.0	5 51.7 2 5.7	49.05 49.10	46.90 47.35	..... .....	49 51 1.68 310 8 20.18	- 0.10 + 0.17	- 1.44 + 0.18	+1 6.39 -1 6.30	+88 47 42.80
11	α Ursæ Minoris	E W	3 ...	1 26 50.0 1 31 20.0	1 54.3 6 24.3	49.55 49.80	47.85 48.10	..... .....	310 8 19.28 49 51 1.22	+ 0.65 + 0.89	+ 0.15 - 1.71	-1 6.24 +1 6.15	+88 47 43.01
12	June 12, L. α Ursæ Minoris	E W	3.5 ...	1 18 25.0 1 22 50.0	6 33.6 2 8.6	49.50 49.20	49.95 49.60	..... .....	310 8 11.20 49 50 56.40	+ 1.02 + 0.68	+ 1.81 - 0.19	-1 5.04 +1 5.01	+88 47 43.11
13	α Ursæ Minoris	W E	3.5 ...	1 26 56.0 1 32 5.0	1 57.4 7 6.4	48.90 49.65	49.50 50.30	..... .....	49 50 56.48 310 8 10.80	+ 0.47 + 1.27	- 0.16 + 2.12	+1 4.97 -1 4.92	+88 47 42.89
14	June 13, L. α Ursæ Minoris S. P.	W E	3.5 ...	13 18 32.0 13 23 4.0	6 27.1 1 55.1	49.20 50.05	50.35 51.20	..... .....	52 15 22.12 307 43 48.32	+ 1.80 + 2.67	+ 1.69 - 0.15	+1 9.95 -1 10.03	+88 47 45.97
15	α Ursæ Minoriss. P.	E W	3 ...	13 26 52.0 13 31 55.0	1 52.9 6 55.9	50.15 49.55	51.45 50.65	..... .....	307 43 48.42 52 15 21.20	+ 2.84 + 2.13	- 0.14 + 1.95	-1 10.08 +1 10.16	+88 47 46.15
16	205 B. Boötis	W E	2.5 ...	14 45 ..... .....	..... .....	47.80 49.70	48.55 50.50	27.018 27.018	359 15 15.95 0 41 9.48	- 0.41 + 1.56	- 0.17 + 0.17	- 0.69 + 0.69	+38 12 18.04
17	June 14, L. α Libræ	W E	3 ...	14 43 6.0 14 48 31.0	2 47.7 2 37.3	47.80 49.70	48.35 50.20	..... .....	305 26 32.35 54 32 40.22	+ 0.47 + 2.39	+14.10 -12.41	-1 17.16 +1 17.18	-15 38 52.15
18	γ Scorpii	E W	3.5 ...	14 56 12.0 15 1 24.0	2 35.1 2 36.9	50.00 49.95	50.65 50.50	..... .....	63 47 44.38 296 11 24.92	+ 2.80 + 2.09	-10.32 +10.56	+1 51.43 -1 51.47	-24 54 34.14
19	θ Coronæ Borealis	W E	2.5 ...	15 29 ..... .....	..... .....	49.40 49.10	50.00 49.60	26.277 26.277	352 44 26.38 7 12 56.22	+ 1.55 + 1.21	- 0.13 + 0.13	+ 7.01 + 7.01	+31 40 54.77

Time	Ther- 3892	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in.</i>			<i>"</i>	<i>"</i>
13 13.3	61.1			12, 13. Instrument in meridian, observation between fixed thread and movable at 25.100 rev.	1	359 59 39.30	
13 14.2	60.3			16, 19. Instrument in meridian, observation at VIII with movable thread.	2	39.26	+1.40
13 14.5	60.2	61.7	29.896		3	38.70	+1.06
13 15.7	61.3	61.2	29.902		4	39.64	
13 16.3	64.6	60.3	29.916		5	39.86	
13 16.9	60.9	68.9	29.978		6	40.28	
13 17.9	61.9				7	39.95	
13 18.12	61.3				8	40.78	
13 19.1	62.9	66.8	29.908		9	39.28	
13 19.9	60.3				10	40.18	
13 20.2	60.3	60.6	29.962		11	40.20	
13 21.9	60.2	60.2	29.964		12	40.10	
13 22.1	60.1	60.3	29.964		13	40.16	
13 23.17	80.3	80.6	29.748	Notes. Faint, clouds.	14	38.18	
13 24.1	80.3	80.7	29.746	9, 16. Clouds.	15	38.24	
13 24.4	70.2	70.9	29.754		16	38.47	-9.08
13 24.46	70.7	70.3	29.928		17	38.57	
13 25.9	70.2				18	37.60	
13 26.7	74.4				19	37.61	-8.29

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	13 H ¹ . Camelop. s. P.	E W	4 ...	15 34 40.0 15 39 22.0	2 35.0 2 7.0	49.60 50.95	50.20 51.25	..... .....	285 52 10.85 74 7 0.20	+ 2.38 + 3.58	- 4 16 + 2.79	-3 11.22 +3 11.25	+66 54 3.36
2	π Scorpii	W E	3.5 ...	15 50 40.0 15 56 14.0	2 43.0 2 51.0	49.80 49.50	50.35 50.05	..... .....	295 15 37.85 64 43 35.88	+ 2.55 + 2.23	+ 11.22 - 12.35	-1 56.43 +1 56.49	-25 50 26.87
3	c ¹ Scorpii	E W	2.5 ...	16 4 1.0 16 9 29.0	2 42.9 2 45.1	49.75 51.40	50.10 51.80	..... .....	66 33 43.02 293 25 26.42	+ 2.39 + 4.10	- 10.87 + 11.16	+2 6.84 -2 6.89	-27 40 46.64
4	ρ Ophiuchi (mean)	E W	2.5 ...	16 17 27.0 16 22 52.0	2 43.0 2 42.0	50.00 51.45	50.20 51.60	..... .....	62 6 58.85 297 52 10.02	+ 2.55 + 4.04	- 11.72 + 11.58	+1 44 19 -1 44.20	-23 13 39.56
5	σ Herculis	W E	2 ...	16 31 ..... .....	..... .....	51.00 49.50	51.10 49.80	27.343 27.343	3 40 45.25 356 15 12.50	+ 2.80 + 1.37	- 0.31 + 0.31	+ 3.60 - 3.60	+42 38 7.04
6	24 Ophiuchi	E W	2.5 ...	16 48 32.0 16 53 57.0	2 49.0 2 36.0	50.25 52.35	50.20 52.30	..... .....	61 53 15.62 298 5 54.08	+ 2.70 + 4.85	- 12.64 + 10.77	+1 43.23 -1 43.25	-22 59 54.57
7	139 G. Scorpii	W E	3 ...	17 8 18.0 17 13 50.0	2 51.9 2 40.1	50.70 49.75	50.80 49.80	..... .....	288 33 35.95 71 25 34.18	+ 3.24 + 2.23	+ 11.15 - 9.67	-2 43.30 +2 43.38	-32 33 14.88
8	σ Ophiuchi	E W	2 ...	17 19 21.5 17 24 29.0	2 43.1 2 24.4	50.00 52.40	50.00 52.60	..... .....	34 41 5.42 325 18 7.62	+ 2.45 + 5.04	- 19.77 + 15.50	+ 38.40 - 38.41	+ 4 13 28.28
9	158 H ¹ . Cephei s. P.	W E	2 ...	17 29 18.0 17 34 28.0	2 14.4 2 55.6	51.95 49.05	51.85 48.95	..... .....	55 53 59.70 304 5 12.60	+ 4.42 + 1.44	+ 0.78 - 1.33	+1 21.83 -1 21.87	+85 8 55.40
10	ν Ophiuchi	E W	2.5 ...	17 51 8.5 17 56 37.0	2 55.9 2 32.6	49.65 53.00	49.75 53.10	..... .....	48 39 41.50 311 19 29.92	+ 2.16 + 5.58	- 17.23 + 12.97	+1 3.12 -1 3.12	- 9 45 35.44
11	μ Lyrae	E W	2 ...	18 21 ..... .....	..... .....	49.30 53.15	49.20 53.10	26.642 26.642	359 26 19.05 0 30 30.08	+ 2.41 + 6.37	+ 0.28 - 0.28	- 0.52 + 0.52	+39 27 24.40
12	June 15, L. ε Boötis	E W	3 ...	14 38 20.3 14 43 44.5	2 45.8 2 38.4	50.70 51.65	52.00 52.80	..... .....	11 26 54.45 348 32 15.75	+ 2.05 + 2.93	- 52.13 + 47.58	+ 11.13 - 11.14	+27 28 36.47
13	β Boötis	W E	3 ...	14 58 ..... .....	..... .....	52.05 51.00	52.70 51.55	26.427 26.427	1 49 18.72 358 7 47.10	+ 2.39 + 1.27	- 0.29 + 0.29	+ 1.77 - 1.77	+40 46 4.51
14	β Coronæ Borealis	E W	2.5 ...	15 24 ..... .....	..... .....	49.80 51.85	50.55 52.55	26.818 26.818	9 27 18.10 350 29 14.25	+ 1.60 + 3.67	+ 0.19 - 0.19	+ 9.21 - 9.21	+29 26 6.37
15	α Coronæ Borealis	W E	2.5 ...	15 28 12.5 15 33 39.5	2 43.5 2 43.5	51.80 50.20	52.25 50.75	..... .....	348 5 50.50 11 53 19.18	+ 2.77 + 1.18	+ 49.05 - 49.03	- 11.61 + 11.62	+27 2 10.54
16	χ Herculis	E W	2.5 ...	15 49 ..... .....	..... .....	49.95 52.15	50.50 52.85	25.763 25.763	356 11 8.82 3 46 50.92	+ 1.50 + 3.81	+ 0.20 - 0.20	- 3.66 + 3.66	+42 43 12.32
17	θ Draconis	W E	3 ...	15 57 33.0 16 3 9.5	2 50.0 2 46.5	52.10 50.20	52.60 50.55	..... .....	19 53 34.00 340 5 35.88	+ 3.11 + 1.09	- 18.64 + 17.89	+ 19.98 - 19.99	+58 49 18.45
18	σ Scorpii	E W	3 ...	16 12 48.0 16 17 22.0	2 53.5 1 49.5	50.05 51.70	50.80 52.30	..... .....	64 15 2.88 295 44 13.68	+ 1.12 + 2.76	- 12.81 + 4.30	+1 54.03 -1 54.06	-25 21 52.61
19	δ Herculis	E W	3 ...	17 8 36.5 17 15 2.7	2 47.6 3 38.6	49.90 51.05	50.45 51.60	..... .....	13 58 10.68 346 0 26.12	+ 0.88 + 2.03	- 44.75 +1 16.11	+ 13.77 - 13.77	+24 57 11.62
20	June 17, L. ε Boötis	W E	3 ...	14 38 12.2 14 43 37.8	2 53.8 2 31.8	49.00 49.95	50.20 51.30	..... .....	348 32 9.48 11 26 47.40	+ 0.12 + 1.13	+ 57.27 - 43.70	- 11.12 + 11.12	+27 28 36.56

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
14 15 37	74.5	.....	.....	5.13. Instrument in meridian, observation at IX with movable thread.	1	359 59 37.84	+13.47
15 53	73.8	75.7	29.929	11.14. Instrument in meridian, observation at I with movable thread.	2	38.72	+ 0.22
16 7	73.1	.....	.....	16. Instrument in meridian, observation at II with movable thread.	3	38.08	- 0.01
16 20	73.0	.....	.....		4	37.60	- 2.10
16 51	72.9	74.8	29.932		5	39.42	.....
17 11	72.2	.....	.....		6	37.68	- 4.34
17 22	71.5	.....	.....		7	38.58	- 5.45
17 32	71.2	73.5	29.930		8	38.12	.....
17 54	70.5	.....	.....		9	38.78	.....
18 8	70.8	.....	.....		10	37.45	.....
18 19	70.8	73.3	29.926		11	38.78	- 6.09
15 14 41	76.7	78.4	29.928		12	35.31	.....
14 57	75.7	.....	.....		13	35.79	.....
15 22	75.0	.....	.....		14	35.82	.....
15 36	74.5	76.3	29.919		15	36.83	.....
15 48	74.5	.....	.....		16	36.46	.....
16 1	74.1	.....	.....		17	36.60	.....
16 16	73.5	75.4	29.924		18	35.95	.....
16 52	72.8	.....	.....		19	35.54	.....
17 11	73.1	74.7	29.911		20	35.85	.....
17 14 37	76.8	79.4	29.886				
14 47	76.2	.....	.....		

Note.
12, 18, 19. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	β Boötis	E W	2.5	14 58	.....	50.15 50.30	51.40 51.70	26.433 26.433	358 7 45.75 1 49 18.02	+ 2.04 + 2.25	+ 0.20 - 0.20	+ 1.77 1.77	+40 46 43.8
2	β Coronæ Borealis	W E	2	15 24	.....	40.95 49.30	51.50 50.05	26.844 26.844	350 29 16.52 9 27 17.88	+ 0.51 - 0.25	- 0.19 + 0.19	- 9.19 + 9.19	+29 26 6.98
3	ε Serpentis	E W	3	15 43 26.0 15 48 58.0	2 54.9 2 37.1	49.40 51.05	50.45 51.90	..... .....	34 8 44.90 325 50 29.05	+ 0.42 + 1.99	- 23.04 + 18.59	+ 37.32 - 37.32	+ 4 45 53.02
4	θ Draconis	E W	2.5	15 57 36.5 16 3 15.5	2 46.3 2 52.7	49.70 51.30	50.70 52.15	..... .....	340 5 35.18 19 53 36.08	+ 0.72 + 2.28	+ 17.84 - 19.24	- 19.92 + 19.93	+58 49 19.28
5	σ Scorpïi	W E	3	16 12 55.0 16 18 16.0	2 46.4 2 34.6	50.65 49.35	51.75 50.35	..... .....	295 44 6.85 64 15 1.85	+ 1.76 + 0.34	+ 11.78 - 10.17	- 1 53.64 + 1 53.66	-25 21 52.80
6	ε Herculis	E W	3.5	16 57	.....	50.00 51.95	51.00 53.00	26.853 26.853	7 49 17.72 352 7 10.28	+ 1.74 + 3.92	+ 0.20 - 0.30	+ 7.60 - 7.60	+31 4 6.18
7	δ Herculis	E W	3.5	17 8 30.3 17 14 52.2	2 53.7 3 28.2	50.00 52.20	51.00 53.05	..... .....	13 58 15.02 346 0 32.90	+ 0.98 + 3.17	- 48.06 + 9.04	+ 13.72 - 13.73	+24 57 11.52
8	June 21, L. θ Coronæ Borealis	E W	2.5	15 29	.....	50.00 50.50	51.55 51.70	27.019 27.019	7 12 23.35 352 43 55.18	+ 3.25 + 3.62	+ 0.13 - 0.13	+ 6.97 - 6.97	+31 40 55.68
9	ε Serpentis	W E	3	15 43 31.0 15 49 2.5	2 49.7 2 41.8	48.55 49.55	50.05 50.90	..... .....	325 50 29.40 34 8 43.30	+ 1.16 + 2.12	+ 21.60 - 19.72	- 37.20 + 37.20	+ 4 45 52.76
10	ω ² Scorpïi	E W	3	15 59 21.0 16 4 50.0	2 45.3 2 43.7	50.20 50.40	51.45 51.85	..... .....	59 30 14.72 300 28 55.45	+ 2.72 + 3.04	- 12.59 + 12.35	+ 1 32.88 - 1 32.88	-20 36 43.20
11	N Scorpïi	W E	3	16 22 47.0 16 28 40.0	2 40.1 3 12.9	47.85 49.40	49.20 50.65	..... .....	286 37 20.65 73 21 56.80	+ 0.39 + 1.93	+ 9.35 - 13.58	- 3 1.38 + 3 1.41	-34 29 52.10
12	53 Herculis	E W	3	16 49	.....	49.55 49.85	50.90 51.00	27.649 27.649	7 1 14.18 352 54 14.62	+ 2.71 + 3.09	+ 0.13 - 0.21	+ 6.80 - 6.80	+31 51 40.12
13	June 25, L. 295 B. Boötis	E W	3	14 45	.....	49.35 50.70	49.00 49.85	26.704 26.704	0 41 16.90 359 15 24.62	+ 1.94 + 3.07	+ 0.26 - 0.26	+ 0.68 - 0.68	+38 12 20.17
14	ι Lupi	W E	4	15 6 26.0 15 11 52.0	2 38.0 2 48.0	48.70 49.95	48.20 49.40	..... .....	289 56 42.32 70 2 28.88	+ 0.45 + 1.70	+ 9.64 - 10.90	- 2 29.56 + 2 29.64	-31 9 56.55
15	ε Draconis	E W	3	15 20 15.0 15 25 34.0	2 49.4 2 29.6	50.80 50.55	50.30 49.85	..... .....	339 36 44.52 20 22 21.70	+ 2.60 + 2.23	+ 17.85 - 13.92	- 20.37 + 20.38	+59 18 9.59
16	γ Coronæ Borealis	W E	3	15 36 18.5 15 41 44.0	2 42.2 2 43.3	49.50 50.15	48.95 49.30	..... .....	347 39 41.48 12 19 30.12	+ 1.27 + 1.79	+ 46.75 - 47.39	- 12.00 + 12.00	+26 35 57.18
17	γ Serpentis	E W	3	15 49 33.5 15 55 4.5	2 46.0 2 45.0	50.45 51.00	49.45 50.00	..... .....	22 56 30.68 337 2 30.70	+ 1.99 + 2.55	- 28.83 + 28.48	+ 23.24 - 23.25	+15 58 25.39
18	κ Herculis	W E	2.5	16 1 27.0 16 6 44.0	2 35.8 2 41.2	50.30 50.20	49.45 49.60	..... .....	338 22 21.85 21 36 50.35	+ 1.90 + 1.95	+ 26.60 - 28.57	- 21.79 + 21.80	+17 18 8.25
19	N Scorpïi	E W	4	16 22 46.0 16 28 10.0	2 40.8 2 43.2	50.70 51.85	49.70 50.85	..... .....	73 21 49.92 286 37 15.12	+ 2.28 + 3.45	- 9.43 + 9.72	+ 3 1.80 - 3 1.83	-34 29 52.37
20	53 Herculis	W E	3	16 49	.....	50.90 50.10	50.05 49.25	27.787 27.787	352 54 10.02 7 1 8.00	+ 1.84 + 0.99	- 0.21 + 0.21	- 6.81 + 6.81	+31 51 41.11

Time.	Ther. 1892.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
17 14 06	70.1	.....	29.870	1. 13. Instrument in meridian, observation at I with movable thread.	1	359 59 15.12	.....
17 14 12	75.4	.....	29.870	2. 20. Instrument in meridian, observation at IX with movable thread.	2	18.41	.....
17 14 17	74.9	70.7	29.870	3. Instrument in meridian, E observation at I, W observation at I + ε with movable thread.	3	35.90	.....
17 14 21	74.8	.....	29.870	4. Instrument in meridian, observation at I with movable thread.	4	36.44	.....
17 14 26	74.5	.....	29.870	5. Instrument in meridian, E observation at II, W observation at I with movable thread.	5	36.22	.....
17 14 30	70.0	.....	29.870		6	35.23	.....
17 14 35	74.3	.....	29.870		7	36.52	.....
17 14 40	74.2	70.0	29.870		8	37.02	- 9.62
17 14 45	75.9	75.9	29.870		9	38.08	.....
17 14 50	72.0	.....	29.870		10	37.84	- 0.94
17 14 55	72.8	.....	29.870		11	37.78	- 0.81
17 15 00	72.5	74.3	29.870		12	38.21	- 0.71
17 15 05	72.8	.....	29.870		13	38.62	- 11.28
17 15 10	72.5	71.8	29.870		14	36.04	+ 5.22
17 15 15	75.5	78.4	29.870		15	37.50	.....
17 15 20	74.2	.....	29.870		16	37.01	- 6.58
17 15 25	73.9	.....	29.870		17	35.78	.....
17 15 30	73.5	.....	29.870		18	37.09	.....
17 15 35	73.5	75.2	29.870		19	35.52	- 0.53
17 15 40	72.5	.....	29.870		20	37.02	- 10.73
17 15 45	72.1	74.1	29.870				

Notes

5, 6, 7, 8, 12 Clouds
 14 Unsteady
 16 E One microscope reading changed from 11" 8 to 17" 2.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	117 G. Scorpil	E W	4 ...	16 53 50.0 16 58 28.0	2 10.4 2 27.6	50.60 51.80	49.60 50.90	..... .....	70 52 27.98 289 6 38.92	+ 2.14 + 3.42	- 6.48 + 8.30	+2 37.14 -2 37.15	-32 0 6.95
2	139 G. Scorpil	E W	4.5 ...	17 8 36.0 17 13 48.0	2 33.3 2 38.7	50.55 52.05	49.50 50.85	..... .....	71 25 34.60 288 33 31.75	+ 2.10 + 3.56	- 8.87 + 9.50	+2 42.14 -2 42.17	-32 33 16.97
3	' Herculis	W E	3 ...	17 37 ..... .....	..... .....	51.30 50.00	50.40 49.05	26.746 26.746	7 6 31.72 352 50 11.28	+ 2.18 + 0.81	- 0.35 + 0.35	+ 6.90 - 6.90	+46 3 34.15
4	67 Ophiuchi	E W	3.5 ...	17 53 19.0 17 58 37.0	2 50.2 2 27.8	50.65 52.20	49.40 50.75	..... .....	35 58 14.00 324 1 0.22	+ 2.06 + 3.57	-20.89 +15.76	+ 39.96 - 39.96	+ 2 56 18.92
5	22 H. Camelop. S. P.	W E	4.5 ...	18 5 8.0 18 9 8.0	3 26.7 0 33.3	52.10 50.15	50.55 48.90	..... .....	71 40 20.35 288 18 41.80	+ 3.40 + 1.56	+ 6.73 - 0.18	+2 44.59 -2 44.62	+69 21 5.05
6	Groombridge 1004 S. P.	E W	3 ...	18 13 4.0 18 16 46.0	2 50.2 6 32.2	50.15 52.50	48.80 51.30	..... .....	305 41 31.80 54 17 31.65	+ 1.54 + 4.02	- 0.86 + 4.55	-1 16.51 +1 16.51	+86 45 22.93
7	June 26, L. ' Draconis	W E	3 ...	15 20 22.0 15 25 50.0	2 42.3 2 45.7	51.05 49.80	50.25 49.20	..... .....	20 22 22.22 339 36 45.42	+ 2.21 + 1.04	-16.38 +17.08	+ 20.30 - 20.31	+59 18 9.25
8	γ Serpentin	W E	3 ...	15 49 31.0 15 54 55.0	2 48.4 2 35.6	50.55 49.75	49.90 49.25	..... .....	337 2 36.50 22 56 29.50	+ 1.78 + 1.03	+29.67 -25.33	- 23.21 + 23.22	+15 58 24.85
9	N Scorpil	E W	3.5 4	16 23 2.0 16 27 26.0	2 24.8 1 59.2	52.10 53.80	50.75 52.35	..... .....	73 21 47.05 286 37 19.90	+ 3.05 + 4.73	- 7.65 + 5.18	+3 1.55 -3 1.61	-34 29 51.21
10	24 Ophiuchi	W E	3.5 ...	16 48 32.0 16 52 53.0	2 48.4 1 32.6	51.60 49.65	50.20 48.50	..... .....	298 5 52.75 61 53 8.95	+ 2.52 + 0.62	+12.55 - 3.80	-1 42.66 +1 42.68	-22 59 54.95
11	157 H ¹ . Cephei S. P.	E W	3 ...	16 56 48.0 17 0 30.0	1 18.6 2 23.4	49.90 53.20	47.75 51.10	..... .....	304 46 12.92 55 12 54.70	+ 0.94 + 4.30	- 0.23 + 0.77	-1 19.12 +1 19.14	+85 50 1.11
12	π Herculis	W E	...	17 12 ..... .....	..... .....	52.60 50.00	51.05 47.90	26.936 26.936	357 58 3.98 1 58 21.00	+ 3.32 + 0.33	- 0.25 + 0.25	+ 1.93 - 1.93	+36 55 7.49
13	158 H ¹ . Cephei S. P.	E W	3.5 3	17 29 0.0 17 34 28.0	2 32.7 2 55.3	49.20 53.85	47.30 51.95	..... .....	304 5 7.92 55 54 0.48	+ 0.31 + 5.10	- 1.01 + 1.33	-1 21.58 +1 21.60	+85 8 51.87
14	67 Ophiuchi	W E	3 ...	17 53 18.5 17 58 49.5	2 50.7 2 40.3	51.00 50.80	49.00 48.45	..... .....	324 0 56.75 35 58 12.48	+ 2.10 + 1.70	+21.02 -18.54	- 40.18 + 40.19	+ 2 56 18.62
15	22 H. Camelop. S. P.	E W	4 ...	18 5 12.0 18 9 16.0	3 22.7 0 41.3	51.30 53.00	49.15 50.90	..... .....	288 18 49.45 71 40 22.88	+ 2.32 + 4.08	- 6.47 + 0.27	-2 45.64 +2 45.73	+69 21 6.66
16	Groombridge 1004 S. P.	W E	4 ...	18 13 46.0 18 17 52.0	3 32.2 7 38.2	52.35 50.95	50.10 48.85	..... .....	54 17 34.68 305 41 38.50	+ 3.38 + 2.02	+ 1.33 - 6.19	+1 17.06 -1 17.11	+86 45 23.69
17	June 27, L. 157 H ¹ . Cephei S. P.	W E	3.5 ...	16 55 35.0 17 0 45.0	2 31.7 2 38.3	52.05 52.00	48.95 48.85	..... .....	55 12 55.52 304 46 13.65	+ 0.11 + 0.07	+ 0.86 - 0.94	+1 20.76 -1 20.76	+85 50 0.69
18	π Herculis	E W	2.5 ...	17 12 ..... .....	..... .....	52.55 52.65	49.50 49.40	26.794 26.794	1 58 21.50 357 58 9.22	+ 1.36 + 1.41	+ 0.25 - 0.25	+ 1.97 - 1.97	+36 55 8.35
19	December 1, L. κ Capricorni	E W	3 ...	21 35 10.0 21 40 3.0	2 1.7 2 51.3	50.10 51.75	50.40 51.40	..... .....	58 11 6.18 301 47 57.92	+ 0.22 + 1.57	- 6.98 +13.83	+1 38.92 -1 38.97	-19 17 45.20

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
25 16 56	72.2	.....	.....	3. 12. Instrument in meridian, observation at IX with movable thread.	1	359 59 37.14	- 3.41
17 12	71.8	.....	.....	18. Instrument in meridian, observation at I with movable thread.	2	36.30	- 4.62
17 30	71.5	73.3	29.688		3	37.06	.....
17 56	71.2	.....	.....		4	37.30	.....
18 8	71.1	.....	.....		5	36.82	.....
18 19	70.9	72.8	29.676		6	36.35	+ 9.38
26 15 23	73.5	76.2	29.589		7	35.79	.....
15 52	72.1	.....	.....		8	36.58	.....
16 26	70.9	71.9	29.592		9	36.10	- 0.47
16 47	70.2	.....	.....		10	36.80	- 4.09
17 4	69.8	.....	.....		11	36.71	+13.58
17 16	68.1	70.8	29.618		12	36.14	.....
17 32	67.4	.....	.....		13	37.08	.....
17 56	67.5	.....	.....		14	37.76	.....
18 8	66.9	.....	.....		15	36.31	.....
18 18	66.2	68.3	29.626		16	36.84	+ 9.69
27 16 55	63.9	66.0	29.854		17	34.64	+13.87
17 15	63.7	64.9	29.854		18	32.78	.....
1 21 38	31.1	32.7	30.519		19	36.34	-12.41

Note.
13. Very faint.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	1 H. Lacertæ	W E	2.5	22 10 ....	.....	51.50 50.55	52.00 50.75	28.060 28.060	0 17 18.18 359 37 36.60	+ 1.01 - 0.11	- 0.27 + 0.27	+ 0.36 - 0.36	+39 15 8.24
2	π Aquarii	E W	2.5	22 18 11.0 22 23 2.0	2 5.1 2 45.9	50.85 52.60	51.00 52.45	.....	38 0 13.10 321 58 48.88	+ 0.92 + 2.55	- 10.78 + 18.96	+ 48.25 - 48.26	+ 0 54 2.12
3	49 G. Piscis Australis	E W	3	22 31 12.0 22 36 40.0	2 8.1 3 19.9	51.15 52.50	51.15 52.40	.....	72 26 9.00 287 32 50.40	+ 1.15 + 2.47	- 6.08 + 14.81	+ 13.22 - 13.29	-33 34 24.65
4	δ Aquarii	W E	3	22 47 7.0 22 52 24.0	2 20.3 2 56.7	51.85 51.45	52.00 51.55	.....	304 46 18.42 55 12 58.65	+ 1.92 + 1.50	+ 9.76 - 15.48	- 1 28.84 + 1 28.88	-16 19 19.34
5	55 Pegasi	E W	2.5	22 59 37.5 23 5 4.5	2 26.5 3 0.5	51.75 53.00	51.55 52.95	.....	30 0 25.82 329 58 34.48	+ 1.65 + 3.02	- 17.98 + 27.30	+ 35.74 - 35.75	+ 8 54 8.71
6	December 4, L. δ Capricorni	W E	3	21 39 17.0 21 44 28.0	2 21.2 2 49.8	51.40 51.50	49.05 49.00	.....	304 32 21.90 55 26 54.45	+ 0.69 + 0.70	+ 9.84 - 14.24	- 1 28.29 + 1 28.33	-16 33 15.76
7	1 H. Lacertæ	E W	2.5	22 10 ....	.....	51.95 53.55	49.05 50.60	27.926 27.926	359 37 40.72 0 17 19.42	+ 1.70 + 3.30	+ 0.27 - 0.27	- 0.35 + 0.35	+39 15 7.02
8	π Aquarii	W E	2.5	22 18 12.5 22 22 58.0	2 3.5 2 42.0	52.85 51.65	50.05 49.05	.....	321 58 56.22 38 0 20.90	+ 1.94 + 0.82	+ 10.51 - 18.08	- 47.68 + 47.69	+ 0 54 1.62
9	ε Piscis Australis	E W	3	22 32 27.0 22 38 6.0	2 47.6 2 51.4	52.30 53.80	49.30 50.85	.....	66 24 54.85 293 34 12.45	+ 1.27 + 2.83	- 11.53 + 12.06	+ 19.14 - 19.18	-27 32 10.99
10	δ Aquarii	E W	2.5	22 46 38.0 22 52 7.0	2 40.1 2 39.9	52.15 54.00	49.30 51.00	.....	55 12 57.68 304 46 11.48	+ 1.19 + 3.02	- 14.17 + 12.67	+ 1 27.78 - 1 27.80	-16 19 19.77
11	55 Pegasi	W E	2.5	22 59 5.5 23 4 30.5	2 58.4 2 26.6	53.60 52.20	50.65 49.45	.....	329 58 33.08 30 0 27.22	+ 2.64 + 1.31	+ 26.67 - 18.01	- 35.30 + 35.30	+ 8 54 7.43
12	11 G. Sculptoris	E W	3.5	23 13 12.0 23 18 44.0	2 50.4 2 41.6	52.25 54.75	49.50 51.60	.....	66 23 0.65 293 36 7.25	+ 1.34 + 3.71	- 11.93 + 10.73	+ 19.06 - 19.08	-27 30 16.47
13	14 Piscium	W E	2.5	23 26 12.0 23 31 30.0	2 54.7 2 23.3	54.25 52.60	51.25 49.75	.....	319 18 44.90 40 40 15.25	+ 3.28 + 1.67	+ 19.86 - 13.36	- 52.52 + 52.53	- 1 46 3.49
14	δ Sculptoris	E W	3.5	23 41 8.0 23 46 42.0	2 41.3 2 52.7	52.80 54.95	49.80 51.80	.....	67 31 46.18 292 27 16.98	+ 1.78 + 3.91	- 10.48 + 12.01	+ 2 27.06 - 2 27.10	-28 39 12.58
15	30 Piscium	W E	3	23 54 4.0 23 59 29.0	2 52.2 2 32.8	54.65 52.85	51.50 49.75	.....	314 32 45.08 45 26 18.50	+ 3.62 + 1.80	+ 17.54 - 13.81	- 1 2.10 + 1 2.12	- 6 32 15.45
16	35 Piscium	E W	2.5	0 7 9.0 0 12 24.0	2 47.3 2 27.7	53.00 55.05	49.85 52.05	.....	30 36 42.28 329 22 30.00	+ 1.92 + 4.09	- 23.07 + 17.98	+ 36.22 - 36.23	+ 8 17 56.03
17	α Ursæ Minoris S. P.	W E	2.5	13 18 30.0 13 22 50.0	7 22.0 3 2.0	49.60 49.85	49.95 50.00	.....	52 14 27.42 307 44 35.95	+ 0.23 + 0.38	+ 2.18 - 0.37	+ 1 19.45 - 1 19.40	+88 48 26.85
18	α Ursæ Minoris S. P.	E W	2.5	13 27 0.0 13 32 0.0	1 8.0 6 8.0	49.90 50.00	49.90 49.85	.....	307 44 36.42 52 14 27.20	+ 0.36 + 0.39	- 0.05 + 1.51	- 1 10.34 + 1 19.29	+88 48 27.71
19	December 5, L. δ Capricorni	E W	2.5	21 39 2.0 21 44 25.5	2 36.0 2 47.5	49.65 48.30	50.50 50.15	.....	55 26 48.82 304 32 12.20	+ 0.88 + 0.52	- 12.02 + 13.85	+ 1 27.80 - 1 27.84	-16 33 16.59
20	1 Pegasi	W E	3	21 58 16.0 22 3 35.5	2 27.5 2 52.0	49.05 49.50	49.50 50.30	.....	325 40 41.30 34 18 31.70	+ 0.07 + 0.71	+ 16.32 - 22.19	- 41.39 + 41.41	+ 4 35 59.13

Time	Ther- moe	Att ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>	1. Instrument in meridian, observation at IX with movable thread. 7. Instrument in meridian, observation at I with movable thread							<i>° ' "</i>	<i>"</i>
1 22 7	29.7	..	..							1	359 59 36.06	-31.11
2 22 22	29.4	..	..							2	36.81	..
3 22 14	29.3	..	..							3	35.84	- 7.26
4 22 06	28.7	30.7	30.511							4	37.40	..
5 21 3	28.5	..	..							5	37.14	-21.62
6 21 42	28.7	29.6	30.060							6	36.09	..
7 22 9	28.2	..	..							7	35.11	-30.82
8 22 11	28.1	..	..							8	36.16	..
9 22 16	27.9	28.8	30.060							9	35.94	..
10 22 56	27.6	..	..							10	35.92	..
11 23 2	27.6	..	..							11	36.46	-21.35
12 23 16	27.7	..	..							12	35.86	- 8.34
13 23 29	27.4	28.4	30.061							13	35.80	-17.02
14 23 44	27.3	..	..							14	35.17	..
15 23 52	27.2	..	..							15	36.18	..
16 0 06	27.1	27.7	30.110							16	36.60	-19.09
17 0 18	27.2	27.1	30.128							17	37.02	..
18 0 32	28.2	29.2	30.133							18	32.80	..
19 0 41	30.4	30.9	30.136							19	32.10	..
20 1 1	34.5	..	..							20	34.96	20.24

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	θ Aquarii	E	3	22 9 4.5	2 35.0	49.70	50.45	.....	47 9 3.02	+ 0.89	-13.76	+1 5.40	- 8 15 6.09
		W	...	22 14 24.5	2 45.0	49.60	50.20	.....	312 49 58.92	+ 0.69	+15.59	-1 5.40	- 8 15 6.09
2	ζ Aquarii (mean)	W	3	22 21 7.0	2 39.8	49.10	49.60	.....	320 33 18.10	+ 0.14	+17.06	- 49.84	- 0 30 3.55
		E	...	22 26 32.0	2 45.2	49.50	50.10	.....	39 24 18.85	+ 0.61	-18.23	+ 49.84	- 0 30 3.55
3	η Pegasi	E	2.5	22 39 ....	.....	49.75	50.40	25.513	9 10 18.18	+ 1.62	+ 0.19	+ 9.83	+29 43 55.17
		W	...	.....	.....	50.10	50.35	25.513	350 47 54.85	+ 1.76	- 0.19	- 9.83	+29 43 55.17
4	ο Andromedæ	W	3	22 58 ....	.....	49.45	49.75	28.347	2 51 20.75	- 0.33	- 0.30	+ 3.08	+41 49 26.42
		E	...	.....	.....	49.60	50.25	28.347	357 3 6.72	0.00	+ 0.30	- 3.08	+41 49 26.42
5	γ Piscium	E	3	23 9 22.0	2 43.1	50.00	50.20	.....	36 8 15.45	+ 0.92	-19.11	+ 44.41	+ 2 46 7.47
		W	...	23 14 28.0	2 22.9	49.80	50.25	.....	323 50 51.95	+ 0.84	+14.67	- 44.42	+ 2 46 7.47
6	θ Piscium	W	2.5	23 20 5.0	2 54.6	49.65	49.90	.....	326 56 18.40	+ 0.57	+23.59	- 39.57	+ 5 51 45.71
		E	...	23 25 26.5	2 26.9	49.90	50.25	.....	33 2 41.38	+ 0.89	-16.70	+ 39.57	+ 5 51 45.71
7	ε Piscium	E	3	23 32 4.0	2 50.6	49.85	50.20	.....	33 47 30.62	+ 0.83	-22.11	+ 40.72	+ 5 6 59.98
		W	...	23 37 26.5	2 31.9	49.90	50.25	.....	326 11 38.75	+ 0.89	+17.53	- 40.73	+ 5 6 59.98
8	φ Pegasi	W	2.5	23 44 52.5	2 37.7	49.30	49.55	.....	339 40 6.85	+ 0.22	+28.79	- 22.55	+18 35 57.47
		E	...	23 50 13.0	2 42.8	50.00	50.35	.....	20 18 59.08	+ 0.99	-30.68	+ 22.55	+18 35 57.47
9	2 Ceti	E	3	23 56 26.0	2 17.1	50.15	50.50	.....	56 45 6.32	+ 1.14	- 9.07	+1 32.70	-17 51 40.79
		W	...	0 1 22.5	2 39.4	50.00	50.35	.....	303 13 55.42	+ 0.98	+12.27	-1 32.73	-17 51 40.79
10	35 Piscium	W	3	0 7 8.0	2 48.2	49.40	49.40	.....	329 22 26.08	+ 0.21	+23.32	- 36.03	+ 8 17 56.35
		E	...	0 12 31.0	2 34.8	50.20	50.65	.....	30 36 36.92	+ 1.26	-19.76	+ 36.04	+ 8 17 56.35
11	10 Ceti	E	3	0 18 45.0	2 51.1	50.35	50.55	.....	39 28 34.18	+ 1.28	-19.53	+ 50.10	- 0 34 16.07
		W	...	0 24 7.0	2 30.9	49.95	50.25	.....	320 30 34.48	+ 0.93	+15.20	- 50.20	- 0 34 16.07
12	319 B. Cephei	W	2.5	0 29 32.0	3 1.1	49.65	49.80	.....	43 2 2.60	+ 0.52	- 2.84	+ 56.90	+81 58 41.04
		E	...	0 35 0.0	2 26.9	49.95	50.35	.....	316 57 2.72	+ 0.97	+ 1.87	- 56.88	+81 58 41.04
13	59 H ¹ . Cassiopeiæ	E	2.5	0 42 7.0	2 43.5	50.30	50.70	.....	335 10 46.50	+ 1.32	+11.96	- 28.18	+63 44 18.49
		W	...	0 47 34.0	2 43.5	50.15	50.40	.....	24 48 17.68	+ 1.10	-11.96	- 28.18	+63 44 18.49
14	1 B. Ursæ Minoris	W	3.5	0 54 15.0	3 25.3	49.90	50.20	.....	49 34 26.40	+ 0.87	- 0.60	+1 11.53	+88 31 21.12
		E	...	0 59 45.0	2 4.7	50.15	50.35	.....	310 24 39.80	+ 1.07	+ 0.22	-1 11.55	+88 31 21.12
15	37 Ceti	W	2.5	1 7 10.0	2 18.0	50.15	50.35	.....	312 39 22.62	+ 1.07	+10.87	-1 6.15	- 8 25 47.65
		E	...	1 12 9.5	2 41.5	50.05	50.25	.....	47 19 45.02	+ 0.97	-14.89	+1 6.18	- 8 25 47.65
16	α Ursæ Minoris	E	3	1 18 20.0	7 31.5	49.80	50.10	.....	310 7 33.62	+ 0.76	+ 2.35	-1 12.31	+88 48 25.64
		W	...	1 22 50.0	3 1.5	50.50	50.75	.....	49 51 28.72	+ 1.45	- 0.38	+1 12.33	+88 48 25.64
17	α Ursæ Minoris	W	3	1 26 48.0	0 56.5	50.45	50.60	.....	49 51 28.48	+ 1.35	- 0.04	+1 12.36	+88 48 25.72
		E	...	1 31 10.0	5 18.5	50.00	50.20	.....	310 7 34.60	+ 0.91	+ 1.17	-1 12.39	+88 48 25.72
18	α Ursæ Minoris S. P.	W	2.5	13 18 30.0	7 21.1	50.00	50.30	.....	52 14 26.80	+ 0.45	+ 2.17	+1 19.21	+88 48 27.82
		E	...	13 22 50.0	3 1.1	49.65	50.15	.....	307 44 37.20	+ 0.20	- 0.37	-1 19.18	+88 48 27.82
19	α Ursæ Minoris S. P.	E	2.5	13 27 0.0	1 8.9	49.90	50.20	.....	307 44 36.60	+ 0.35	- 0.05	-1 19.16	+88 48 28.01
		W	...	13 31 46.0	5 54.9	50.35	50.90	.....	52 14 26.68	+ 0.93	+ 1.40	+1 19.12	+88 48 28.01
20	December 6, I. ζ Aquarii (mean)	E	2.5	22 21 14.0	2 32.8	50.25	51.00	.....	39 24 18.72	+ 1.43	-15.60	+ 49.07	- 0 30 3.07
		W	...	22 26 27.0	2 40.2	49.95	50.90	.....	320 34 42.80	+ 1.22	+17.15	- 49.08	- 0 30 3.07

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
5 22 12	34.3	.....	.....	2 W. Instrument in meridian, observation assumed to be on movable thread at 27,000 rev.				1	359 59 32.68	.....
22 25	34.6	.....	.....	3. Instrument in meridian, observation at I with movable thread.				2	30.74	-18.42
22 34	34.0	36.0	30.321	4. Instrument in meridian, observation at IX with movable thread.				3	32.42	.....
22 55	33.7	.....	.....					4	33.51	.....
23 12	33.3	.....	.....					5	32.36	.....
23 23	33.3	.....	.....					6	34.06	.....
23 35	33.1	35.7	30.325					7	33.25	.....
23 48	33.1	.....	.....					8	32.62	.....
23 59	32.8	.....	.....					9	33.52	.....
0 10	32.7	.....	.....					10	34.02	-19.00
0 22	32.3	.....	.....					11	33.26	-15.59
0 33	32.3	33.7	30.320					12	32.93	-31.76
0 45	32.3	.....	.....					13	33.30	-29.77
0 57	32.1	.....	.....					14	33.87	-29.55
1 10	31.7	.....	.....					15	32.84	-11.04
1 21	31.7	.....	.....					16	33.27	.....
1 34	31.0	32.9	30.321					17	33.22	.....
13 17	28.0	26.6	30.258					18	33.24	.....
13 32	28.7	28.4	30.266					19	32.94	.....
6 22 24	39.3	40.8	30.162					20	32.86	-18.32

Note.

2. Mean of two microscopes used.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ε Piscis Australis	W E	3 ...	22 32 34.0 22 37 55.0	2 40.4 2 40.6	49.80 49.95	50.30 50.75	.....	293 34 9.35 66 24 53.60	+ 0.82 + 1.14	+10.56 -10.59	-2 16.18 +2 16.21	-27 32 11.11
2	β Pegasi	E W	2.5 ...	22 56 18.5 23 1 40.5	2 42.2 2 39.8	50.05 50.10	50.35 50.60	.....	11 20 55.92 348 38 6.88	+ 0.99 + 1.12	-50.27 +48.80	+ 12.01 - 12.01	+27 34 29.86
3	γ Piscium	W E	2.5 ...	23 9 15.0 23 14 45.0	2 50.0 2 40.0	49.55 50.00	50.00 50.45	.....	323 50 45.70 36 8 17.18	+ 0.56 + 1.02	+20.76 -18.40	- 43.67 +43.67	+ 2 46 6.73
4	θ Piscium	E W	2.5 ...	23 20 14.5 23 25 37.0	2 45.1 2 37.4	50.15 50.00	50.50 50.45	.....	33 2 46.42 326 56 20.10	+ 1.12 + 0.98	-21.09 +19.17	+ 38.90 - 38.90	+ 5 51 44.79
5	ι Piscium	W E	2.5 ...	23 32 4.5 23 37 34.0	2 50.1 2 39.4	49.35 50.00	49.85 50.40	.....	326 11 33.50 33 47 28.85	+ 0.35 + 0.98	+21.98 -19.30	- 40.02 +40.02	+ 5 6 59.43
6	30 Piscium	E W	3 ...	23 54 10.0 23 59 20.0	2 46.0 2 30.0	50.10 50.15	50.50 50.50	.....	45 26 20.28 314 32 47.12	+ 1.09 + 1.12	-16.30 +13.31	+1 0.70 -1 0.70	- 6 32 15.67
7	γ Pegasi	W E	2.5 ...	0 5 23.0 0 10 51.5	2 48.6 2 39.9	49.40 49.80	49.75 50.35	.....	335 43 56.20 24 15 7.42	+ 0.33 + 0.85	+28.40 -25.54	- 26.06 +26.98	+14 39 40.92
8	319 B. Cephei	E W	3 ...	0 29 30.0 0 34 50.0	3 2.9 2 23.1	50.10 49.85	50.40 50.30	.....	316 56 59.68 43 2 3.40	+ 1.03 + 0.84	+ 2.90 - 1.77	- 55.06 +55.99	+81 58 42.19
9	59 H ¹ . Cassiopeiae	W E	2.5 ...	0 42 21.0 0 47 41.0	2 20.5 2 50.5	40.65 49.60	50.20 50.00	.....	24 48 16.85 335 10 45.28	+ 0.72 + 0.58	-10.00 +13.00	+ 27.75 - 27.76	+63 44 18.90
10	ι B. Ursae Minoris	E W	3 ...	0 54 40.0 0 58 52.0	2 59.6 1 12.4	49.60 50.25	50.00 50.95	.....	310 24 38.08 49 34 25.78	+ 0.58 + 1.39	+ 0.46 - 0.08	-1 10.50 +1 10.53	+88 31 21.29
11	τ Piscium	W E	...	1 6 ..... .....	..... .....	50.15 49.80	50.55 50.10	27.003 27.003	350 38 29.90 9 17 44.68	+ 0.41 - 0.01	- 0.19 + 0.19	+ 9.89 - 9.89	+29 35 29.53
12	α Ursae Minoris	E W	3 ...	1 18 25.0 1 22 50.0	7 25.8 3 0.8	49.50 50.15	49.00 51.00	.....	310 7 33.52 49 51 29.32	+ 0.46 + 1.36	+ 2.29 - 0.38	-1 11.35 +1 11.38	+88 48 25.17
13	α Ursae Minoris	W E	3.5 ...	1 26 51.0 1 31 30.0	1 3.2 5 45.2	50.35 49.85	51.00 50.05	.....	40 51 29.72 310 7 32.85	+ 1.46 + 0.71	- 0.05 + 1.37	+1 11.38 +1 11.38	+88 48 26.27
14	α Ursae Minoris S. P.	W E	3.5 ...	13 18 30.0 13 22 55.0	7 20.3 2 55.3	49.45 50.60	40.75 51.00	.....	52 14 28.72 307 44 34.78	+ 0.43 + 1.67	+ 2.16 - 0.34	+1 17.98 -1 17.96	+88 48 27.64
15	α Ursae Minoris S. P. December 7, L.	E W	3.5 ...	13 27 0.0 13 31 38.0	1 0.7 5 47.7	50.85 49.85	51.20 50.25	.....	307 44 34.05 52 14 28.22	+ 1.00 + 0.89	- 0.05 + 1.35	-1 17.93 +1 17.89	+88 48 28.02
16	38 Pegasi	W E	3 ...	22 26 ..... .....	..... .....	48.65 49.60	50.15 51.10	27.175 27.175	353 8 30.62 6 47 30.70	- 0.35 + 0.63	- 0.21 + 0.21	- 7.00 + 7.00	+32 5 39.04
17	γ Piscis Australis	E W	3.5 ...	22 44 14.0 22 49 44.0	2 50.9 2 39.1	50.05 49.70	51.40 50.70	.....	72 14 35.35 287 44 27.68	+ 1.74 + 1.21	-10.86 + 9.42	+3 1.45 -3 1.56	-33 22 38.68
18	β Pegasi	W E	2.5 ...	22 56 18.3 23 1 38.5	2 42.3 2 37.9	49.10 49.85	50.05 50.90	.....	348 38 5.80 11 20 54.38	+ 0.57 + 1.38	+50.33 -47.03	- 11.80 +11.80	+27 34 29.26
19	δ ¹ Aquarii	E W	3 ...	23 11 12.0 23 17 28.5	2 38.6 3 37.9	49.95 49.50	50.90 50.35	.....	40 1 28.98 310 57 22.60	+ 1.45 + 0.92	-13.01 +26.26	+1 7.58 -1 7.58	-10 7 34.17
20	ι H. Cassiopeiae	W E	2.5 ...	23 22 40.0 23 28 5.0	2 50.0 2 35.0	49.15 49.15	50.10 50.25	.....	10 6 16.80 340 52 50.00	+ 0.62 + 0.69	-19.82 +16.49	+ 20.36 - 20.37	+58 2 2.36

Time	Ther- moe	All- ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905 o.
<i>h m s</i>	<i>s</i>	<i>s</i>	<i>in</i>	11.16 Instrument in meridian, observation at IX with movable thread.						1	359 59 32.46	..
6 22 46	19.0	..	..							2	31.73	..
6 22 59	18.9	..	..							3	31.41	..
6 23 12	18.6	..	..							4	31.15	..
6 23 24	18.6	..	..							5	31.18	..
6 23 37	18.7	45.0	30.113							6	31.11	..
6 23 50	18.6	..	..							7	31.84	..
6 24 3	18.1	..	..							8	31.06	-31.93
6 24 17	17.1	48.7	30.149							9	31.21	-29.89
6 24 31	16.8	..	..							10	31.12	-29.76
6 24 45	16.1	..	..							11	32.55	-21.95
6 25 1	15.1	..	..							12	31.10	..
6 25 14	15.1	36.2	30.166							13	31.03	..
6 25 27	14.4	31.1	30.141							14	31.72	..
6 25 40	14.1	31.6	30.111							15	33.16	..
6 25 53	14.1	30.1	30.121							16	32.89	-28.74
6 26 6	14.0	..	..							17	34.22	- 6.67
6 26 19	14.0	..	..							18	34.49	..
6 26 32	14.0	..	..							19	34.15	-14.10
6 26 45	14.0	..	..							20	32.18	-31.67

Note

19 E. One microscope reading increased 10".

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	μ Sculptoris	E W	3.5 ...	23 32 46.0 23 38 6.0	2 43.3 2 36.7	49.55 49.60	50.50 50.50	..... .....	71 27 50.90 288 31 12.12	+ 1.04 + 1.05	-10.05 + 9.26	+2 53.85 -2 53.95	-32 35 46.85
2	α Ceti	W E	3.5 ...	23 56 12.0 0 1 22.0	2 31.0 2 39.0	48.55 48.80	49.50 49.95	..... .....	303 13 53.90 56 45 12.90	+ 0.01 + 0.36	+11.01 -12.20	-1 29.68 +1 29.78	-17 51 41.02
3	γ Pegasi	E W	3 ...	0 5 31.0 0 10 3.5	2 40.4 1 52.1	49.10 49.70	50.25 50.90	..... .....	24 15 7.15 335 44 10.05	+ 0.66 + 1.32	-25.70 +12.56	+ 26.61 - 26.64	+14 39 41.06
4	ι Ceti	W E	3.5 ...	0 19 15.0 0 23 42.0	2 20.8 2 6.2	48.95 49.10	50.00 50.25	..... .....	320 30 35.15 39 28 26.85	+ 0.46 + 0.66	+13.23 -10.63	- 48.79 + 48.81	- 0 34 16.04
5	ι Ceti	E W	3.5 ...	0 27 22.5 0 32 57.0	2 49.7 2 44.8	49.45 49.55	50.75 50.80	..... .....	43 0 53.78 316 58 10.98	+ 1.10 + 1.19	-17.86 +16.85	+ 55.30 - 55.30	- 4 6 42.52
6	32^2 H. Camelop. s. p.	W E	3.5 ...	0 45 58.0 0 51 0.0	2 5.4 2 56.6	49.05 48.50	50.15 49.35	..... .....	57 7 26.32 302 51 39.00	+ 0.60 - 0.09	+ 0.84 - 1.67	+1 31.45 -1 31.48	+83 55 16.50
7	γ Piscium	E W	2.5 ...	0 57 15.0 1 2 32.0	2 40.5 2 36.5	48.60 49.80	49.70 50.75	..... .....	24 28 21.75 335 30 43.52	+ 0.13 + 1.28	-25.55 +24.29	+ 27.00 - 27.00	+14 26 26.16
8	f Piscium	W E	3.5 ...	1 10 4.0 1 15 29.0	2 40.9 2 44.1	49.30 48.45	50.15 49.55	..... .....	324 11 46.00 35 47 19.65	+ 0.73 - 0.02	+18.75 -19.50	- 42.70 + 42.67	+ 3 7 6.77
9	α Ursæ Minoris	E W	4 ...	1 22 10.0 1 27 20.0	3 39.8 1 30.2	48.50 49.65	49.60 50.40	..... .....	310 7 33.28 49 51 31.38	+ 0.04 + 1.04	+ 0.56 - 0.09	-1 10.11 +1 10.11	+88 48 26.12
10	December 10, L. α Ursæ Minoris s. p.	W E	4 ...	13 18 30.0 13 22 50.0	7 17.1 2 57.1	51.30 51.90	48.75 49.20	..... .....	52 14 29.28 307 44 34.98	+ 0.34 + 0.87	+ 2.13 - 0.35	+1 16.45 -1 16.40	+88 48 28.67
11	α Ursæ Minoris s. p.	E W	4 ...	13 27 46.0 13 31 26.0	1 58.9 5 38.9	52.05 51.65	49.50 49.15	..... .....	307 44 34.80 52 14 29.10	+ 1.10 + 0.72	- 0.16 + 1.28	-1 16.37 +1 16.33	+88 48 29.19
12	December 11, L. γ Pegasi	E W	3 ...	22 26 ..... .....	..... .....	51.50 49.90	49.80 48.35	27.134 27.134	6 47 30.48 353 8 30.98	+ 3.87 + 2.29	+ 0.13 - 0.13	+ 6.89 - 6.90	+32 5 39.22
13	η Pegasi	W E	3 ...	22 39 ..... .....	..... .....	49.45 51.20	47.85 49.50	25.570 25.570	350 47 56.00 9 10 18.15	+ 0.51 + 2.24	- 0.19 + 0.19	- 9.32 + 9.32	+29 43 55.33
14	ϵ^2 Aquarii	E W	4 ...	23 1 24.0 23 6 40.0	2 48.8 2 27.2	51.95 50.20	49.75 48.45	..... .....	60 34 25.80 299 24 41.95	+ 3.48 + 1.92	-12.90 + 9.81	+1 42.24 -1 42.30	-21 41 6.84
15	ψ^3 Aquarii	W E	3.5 ...	23 11 9.0 23 16 43.0	2 41.2 2 52.8	49.90 52.00	47.75 50.05	..... .....	310 57 35.35 49 1 33.08	+ 1.42 + 3.67	+14.37 -16.52	-1 6.62 +1 6.62	-10 7 34.38
16	ι H. Cassiopeiæ	E W	3 ...	23 23 26.0 23 27 35.0	2 3.5 2 5.5	52.10 50.70	50.00 48.55	..... .....	340 52 54.75 19 6 10.88	+ 3.70 + 2.24	+10.47 -10.81	- 20.07 + 20.07	+58 2 3.54
17	κ Andromedæ	W E	3 ...	23 36 ..... .....	..... .....	50.25 51.55	48.10 49.70	29.018 29.018	4 50 24.65 355 3 8.52	+ 1.03 + 2.53	- 0.32 + 0.32	+ 4.96 - 4.96	+43 48 58.74
18	δ Sculptoris	W E	3.5 ...	23 41 9.0 23 46 36.0	2 39.6 2 47.4	50.25 51.75	47.90 49.65	..... .....	292 27 11.52 67 31 53.42	+ 1.67 + 3.34	+10.26 -11.29	-2 18.99 +2 18.97	-28 39 13.21
19	β Piscium	E W	3 ...	23 57 27.0 0 2 55.0	2 51.6 2 36.4	52.40 50.55	49.90 48.40	..... .....	45 8 11.85 314 50 55.10	+ 3.80 + 2.08	-17.52 +14.55	+ 58.14 - 58.16	- 6 14 4.57
20	σ Andromedæ	W E	2.5 ...	0 13 ..... .....	..... .....	49.95 51.70	47.80 49.80	27.750 27.750	357 18 22.92 2 36 52.32	+ 0.73 + 2.66	- 0.24 + 0.24	- 2.69 + 2.69	+36 15 58.18

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
7 23 35	45.6	47.4	30.112	12. Instrument in meridian, observation at II with movable thread.				1	359 59 32.11	- 5.96
23 59	45.2	...	...	13, 17, 20. Instrument in meridian, observation at IX with movable thread.				2	33.04	...
0 8	43.6	...	...					3	33.00	...
0 22	42.3	...	...					4	32.87	-15.38
0 30	42.2	43.7	30.118					5	33.02	...
0 48	42.8	...	...					6	32.48	...
1 0	41.9	...	...					7	32.71	-18.23
1 13	42.9	...	...					8	32.79	...
1 25	43.1	44.5	30.126					9	33.10	...
10 13 18	32.7	32.2	29.510					10	33.65	...
13 32	33.6	33.7	29.510					11	33.40	...
11 22 25	46.2	47.5	29.500					12	34.22	-28.43
22 37	45.9	...	...					13	34.99	...
23 4	43.9	...	...					14	35.00	...
23 14	43.5	45.7	29.499					15	35.08	-13.81
23 26	43.6	...	...					16	35.62	-33.75
23 45	44.4	...	...					17	35.70	-30.55
0 0	43.6	...	...					18	34.45	...
0 11	43.5	...	...					19	34.92	...
								20	34.88	...

Note.
11. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Cassiopeiae	W	3	0 28 42.0	2 50.1	49.70	47.30	.....	14 27 27.02	+ 1.09	-29.32	+ 14.93	+53 22 56.18
		E	...	0 34 5.0	2 32.9	51.65	49.50	.....	345 31 42.95	+ 3.21	+23.69	- 14.92	
2	δ Piscium	E	3	0 40 57.0	2 38.8	51.70	49.75	.....	31 50 11.52	+ 3.35	-20.12	+ 35.89	+ 7 4 21.35
		W	...	0 46 23.0	2 47.2	49.35	47.10	.....	328 8 52.55	+ 0.80	+22.31	- 35.88	
3	ε Piscium	W	3	0 55 2.0	2 49.4	48.50	46.50	.....	328 27 31.45	+ 0.06	+23.09	- 35.42	+ 7 22 59.64
		E	...	1 0 25.0	2 33.6	51.70	49.50	.....	31 31 33.80	+ 3.24	-18.98	+ 35.41	
4	f Piscium	E	3	1 10 36.0	2 8.6	51.85	49.80	.....	35 47 12.58	+ 3.47	-11.98	+ 41.59	+ 3 7 6.28
		W	...	1 15 27.0	2 42.4	49.60	47.40	.....	324 11 46.08	+ 1.08	+19.10	- 41.59	
5	α Ursæ Minoris	W	3	1 21 40.0	4 6.8	49.15	46.30	.....	49 51 38.10	+ 0.30	- 0.69	+1 8.38	+88 48 27.76
	December 12, L.	E	...	1 27 35.0	1 48.2	51.55	48.80	.....	310 7 29.60	+ 2.80	+ 0.13	-1 8.41	
6	α² Aquarii	W	3	23 1 21.0	2 51.7	49.55	47.60	.....	299 24 37.65	+ 0.92	+13.34	-1 41.17	-21 41 7.01
		E	...	23 6 52.0	2 39.3	51.00	48.85	.....	60 34 26.28	+ 2.29	-11.48	+1 41.22	
7	β¹ Aquarii	E	3	23 15 11.0	2 37.7	51.40	49.30	.....	59 30 21.55	+ 2.73	-11.46	+1 37.05	-20 36 58.98
		W	...	23 20 32.0	2 43.3	50.50	48.15	.....	300 28 41.50	+ 1.68	+12.29	-1 37.10	
8	μ Sculptoris	W	3	23 32 34.0	2 54.7	49.25	47.00	.....	288 31 7.78	+ 0.46	+11.50	-2 49.65	-32 35 47.35
		E	...	23 38 8.0	2 39.3	50.80	48.50	.....	71 27 56.20	+ 2.02	- 9.56	+2 49.68	
9	27 Piscium	W	3	23 51 27.0	2 11.7	49.65	47.10	.....	317 0 16.48	+ 0.72	+10.77	- 53.51	- 4 4 43.51
		E	...	23 56 44.0	3 5.3	50.65	48.35	.....	42 59 0.95	+ 1.86	-21.31	+ 53.51	
10	α Andromedæ	E	2.5	0 0 55.5	2 23.5	50.95	48.55	.....	10 20 59.20	+ 2.12	-42.71	+ 10.50	+28 34 21.85
		W	...	0 5 24.7	2 5.7	50.30	48.05	.....	349 38 15.48	+ 1.53	+32.78	- 10.51	
11	6 B. Ursæ Minoris s.p.	W	3	0 11 22.0	2 23.6	50.10	47.70	.....	52 49 58.40	+ 1.25	+ 0.34	+1 15.77	+88 13 2.52
		E	...	0 16 50.0	3 4.4	51.05	48.25	.....	307 9 8.68	+ 2.02	- 0.56	-1 15.80	
12	ζ Cassiopeiae	E	2.5	0 28 41.0	2 51.0	50.95	48.55	.....	345 31 38.72	+ 2.12	+29.63	- 14.86	+53 22 56.33
		W	...	0 34 7.0	2 35.0	50.65	48.45	.....	14 27 22.30	+ 1.91	-24.34	+ 14.86	
13	δ Piscium	W	3.5	0 40 33.0	3 2.7	50.45	48.10	.....	328 8 48.28	+ 1.64	+26.64	- 35.77	+ 7 4 22.26
		E	...	0 46 12.5	2 36.8	51.10	48.60	.....	31 50 11.42	+ 2.23	-19.62	+ 35.78	
14	ε Piscium	E	3.5	0 55 10.0	2 41.3	51.45	48.55	.....	31 31 34.68	+ 2.38	-20.94	+ 35.36	+ 7 22 59.93
		W	...	1 0 34.0	2 42.7	51.05	48.45	.....	328 27 29.75	+ 2.12	+21.30	- 35.30	
15	ν Piscium	W	3	1 11 7.0	2 58.6	50.35	47.75	.....	347 49 46.22	+ 1.40	+57.38	- 12.42	+26 46 14.70
		E	...	1 16 32.5	2 26.9	50.80	48.40	.....	12 9 1.18	+ 1.97	-38.83	+ 12.40	
16	38 Cassiopeiae	E	3	1 21 26.0	2 37.1	50.70	48.40	.....	329 8 15.55	+ 1.92	+ 7.06	- 34.33	+69 47 1.53
		W	...	1 26 30.0	2 26.9	50.85	48.45	.....	30 50 49.55	+ 2.02	- 6.17	+ 34.31	
17	ε Sculptoris	W	4	1 38 12.0	2 50.0	50.40	47.65	.....	295 34 30.78	+ 1.38	+12.27	-1 59.53	-25 31 33.78
		E	...	1 43 34.0	2 32.0	50.75	48.25	.....	64 24 34.40	+ 1.86	- 9.81	+1 59.55	
18	λ Arietis	E	...	1 49 36.0	2 53.2	50.65	48.15	.....	15 47 0.30	+ 1.76	-43.01	+ 16.26	+23 8 15.84
		W	...	1 55 6.5	2 37.3	50.60	48.10	.....	344 12 12.50	+ 1.72	+35.49	- 16.26	
19	6 Persei	W	2.5	2 4 33.5	2 35.9	50.10	47.65	.....	11 42 26.32	+ 1.22	-32.23	+ 11.92	+50 37 50.02
		E	...	2 9 38.7	2 29.3	50.35	47.65	.....	348 16 41.75	+ 1.35	+29.55	- 11.92	
20	27 Arietis	E	3	2 22 34.0	2 55.4	50.70	47.60	.....	21 37 45.48	+ 1.52	-33.81	+ 22.81	+17 17 15.33
		W	...	2 28 8.0	2 38.6	50.60	47.60	.....	338 21 26.82	+ 1.47	+27.64	- 22.81	

Time.	Ther. 1905.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
11 0 20	41.9	45.8	29.590					1	359 59 34.32	
0 44	44.0							2	35 21	
0 58	45.2							3	30 42	
1 13	45.6							4	35 16	
1 29	45.2	46.2	29.574					5	35 10	
12 23 5	40.8	51.4	29.562					6	34 52	
23 17	49.1							7	34 12	-10.01
23 35	48.5							8	34 22	- 5.63
23 55	48.6							9	34 24	
0 3	48.4	50.1	29.564					10	34 20	
0 15	47.6							11	35 05	
0 31	47.1							12	35 17	
0 41	47.2							13	35 10	
0 58	46.9							14	34 64	
1 14	47.5	49.1	29.580					15	34 65	
1 35	48.9							16	34 96	
1 41	48.1							17	35 45	
1 52	48.6							18	34 18	-16.79
2 8	48.6	49.7	29.592					19	33 98	-21.05
2 26	48.6							20	34 56	-12.59

Notes.

11. Clouds.
 12 E. One microscope reading increased 30 "
 14 E. Clock time increased 1m

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	π Ceti	W	3	2 36 43.0	2 43.8	49.80	46.95	.....	306 49 46.30	+ 0.72	+ 13.78	-1 16.66	-14 15 33.88
		E	...	2 42 8.0	2 41.2	50.60	47.65	.....	53 9 20.62	+ 1.49	- 13.35	+1 16.68	
2	τ^3 Eridani	E	3.5	2 55 15.0	2 47.9	51.45	48.30	.....	62 52 56.00	+ 2.26	- 12.27	+1 51.99	-23 59 46.21
		W	...	3 0 27.0	2 24.1	51.40	47.95	.....	297 6 12.92	+ 2.05	+ 9.04	-1 52.00	
3	ζ Eridani	W	3	3 8 34.0	2 30.0	50.60	47.45	.....	311 54 51.48	+ 1.39	+ 12.66	-1 4.05	- 9 10 16.44
		E	...	3 13 34.0	2 30.0	50.70	47.35	.....	48 4 15.12	+ 1.39	- 12.66	+1 4.05	
4	α H. Camelop.	E	2.5	3 18 7.0	3 9.4	50.95	47.85	.....	339 18 1.70	+ 1.77	+ 21.79	- 21.75	+59 36 48.25
		W	...	3 23 30.0	2 13.6	51.50	48.25	.....	20 40 53.30	+ 2.25	- 10.84	+ 21.75	
5	η H ¹ . Camelop.	W	2.5	3 30 57.0	2 52.0	50.65	47.60	.....	23 58 49.32	+ 1.49	- 14.06	+ 25.63	+62 54 43.93
		E	...	3 36 17.0	2 28.0	50.65	47.60	.....	336 0 21.80	+ 1.49	+ 10.41	- 25.64	
6	α Tauri	E	...	3 41 37.0	1 45.5	51.20	48.00	.....	15 8 55.42	+ 1.98	- 16.53	+ 15.62	+23 45 54.23
	December 13, L.	W	...	3 47 14.5	3 52.0	51.55	48.30	.....	344 49 4.88	+ 2.31	+1 19.87	- 15.64	
7	ψ^3 Aquarii	E	3.5	23 11 25.0	2 25.0	49.20	49.45	.....	49 1 28.38	+ 2.86	- 11.63	+1 7.24	-10 7 33.65
		W	...	23 16 18.0	2 28.0	49.25	49.55	.....	310 57 38.22	+ 2.94	+ 12.12	-1 7.27	
8	ι Piscium	E	2.5	23 27 18.0	1 47.8	48.95	49.20	.....	40 40 9.98	+ 2.62	- 7.56	+ 50.27	- 1 46 3.11
		W	...	23 31 9.0	2 3.2	49.35	49.65	.....	319 18 52.92	+ 3.02	+ 9.88	- 50.28	
9	ω Piscium	W	2.5	23 51 22.5	2 53.5	48.20	48.55	.....	327 25 5.35	+ 1.87	+ 23.58	- 37.46	+ 6 20 33.19
		E	...	23 57 0.0	2 44.0	48.15	48.45	.....	32 34 2.28	+ 1.81	- 21.07	+ 37.47	
10	γ H. Draconis S.P.	E	2.5	0 5 0.0	2 31.4	48.05	48.40	.....	297 4 53.22	+ 1.71	- 2.24	-1 54.24	+78 8 5.54
		W	...	0 10 20.0	2 48.6	49.30	49.60	.....	62 54 13.85	+ 2.95	+ 2.78	+1 54.25	
11	π Andromedæ	W	2.5	0 32 ....	.....	48.40	48.65	28.186	354 14 23.48	+ 1.27	- 0.22	- 5.88	+33 12 12.34
		E	...	.....	.....	47.70	47.95	28.186	5 40 20.85	+ 0.56	+ 0.22	+ 5.88	
12	ν Andromedæ	E	...	0 45 ....	.....	48.00	48.10	25.445	358 20 22.40	+ 2.25	+ 0.29	- 1.69	+40 34 8.05
		W	...	.....	.....	49.30	49.30	25.445	1 38 0.85	+ 3.57	- 0.29	+ 1.69	
13	μ Cassiopeiæ	W	2.5	0 59 4.0	2 44.8	48.20	48.50	.....	15 32 8.38	+ 1.88	- 24.99	+ 16.36	+54 27 41.87
		E	...	1 4 29.0	2 40.2	47.50	47.55	.....	344 27 3.18	+ 1.00	+ 23.63	- 16.38	
14	ν Piscium	E	2.5	1 11 31.5	2 34.0	47.80	47.70	.....	12 9 5.98	+ 1.24	- 42.68	+ 12.70	+26 46 14.69
		W	...	1 16 22.5	2 17.0	49.10	49.40	.....	347 50 9.18	+ 2.81	+ 33.78	- 12.70	
15	η Piscium	W	2.5	1 23 24.0	2 50.7	48.65	48.70	.....	335 55 54.48	+ 2.20	+ 29.32	- 26.33	+14 51 39.32
		E	...	1 28 52.7	2 38.0	48.00	48.10	.....	24 3 11.80	+ 1.54	- 25.11	+ 26.34	
16	ϵ Sculptoris	E	3	1 38 34.0	2 27.9	48.65	48.65	.....	64 24 30.30	+ 2.13	- 9.29	+2 2.75	-25 31 32.70
		W	...	1 43 22.0	2 20.1	49.65	49.55	.....	295 34 38.30	+ 3.12	+ 8.33	-2 2.80	
17	λ Arietis	W	3	1 49 42.2	2 46.9	48.50	48.70	.....	344 12 10.10	+ 2.13	+ 39.94	- 16.71	+23 8 15.77
		E	...	1 55 7.7	2 38.6	47.90	48.20	.....	15 46 55.28	+ 1.53	- 36.07	+ 16.72	
18	δ Persei	E	2.5	2 4 17.0	2 52.3	48.65	48.70	.....	348 16 33.60	+ 2.16	+ 39.36	- 12.27	+50 37 50.51
		W	...	2 9 37.0	2 27.7	50.00	49.85	.....	11 42 23.55	+ 3.45	- 28.93	+ 12.27	
19	α Arietis	W	3	2 22 38.0	2 51.3	48.85	48.95	.....	338 21 24.02	+ 2.42	+ 32.24	- 23.47	+17 17 15.47
		E	...	2 28 8.5	2 39.2	47.70	47.90	.....	21 37 40.88	+ 1.30	- 27.85	+ 23.47	
20	π Ceti	E	3	2 36 45.0	2 41.7	48.00	48.25	.....	53 9 19.22	+ 1.61	- 13.43	+1 18.92	-14 15 33.59
		W	...	2 42 12.0	2 45.3	49.85	49.75	.....	306 49 47.15	+ 3.36	+ 14.04	-1 18.94	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
12 2 40	48.2	...	...	11. Instrument in meridian, observation at IX with movable thread.						1	359 59 34.79	.....
2 58	47.9	49.2	29.596	12. Instrument in meridian, observation at I with movable thread.						2	35 00	.....
3 12	47.9	...	...							3	34 69	- 3.41
3 21	47.9	...	...							4	34 98	.....
3 34	47.6	...	...							5	34 22	-11.32
3 44	47.6	...	...							6	33 96	- 6.30
23 14	45.3	48.9	29.604							7	36 43	-13.72
23 30	44.8	46.8	29.889							8	35 42	-16.33
23 50	44.7	...	...							9	35 92	.....
0 8	43.8	45.4	29.903							10	36 14	.....
0 29	43.5	...	...							11	36 46	.....
0 42	42.9	...	...							12	35 98	.....
1 1	42.6	44.3	29.910							13	36 53	.....
1 14	41.6	...	...	Notes.						14	35 16	.....
1 26	41.6	...	...	2. Clouds.						15	35 12	.....
1 41	40.9	...	...	9 E. Clock time increased 30 ^m .						16	36 42	.....
1 52	40.6	...	...							17	36 46	-16.83
2 7	40.3	42.3	29.926							18	36 60	-21.23
2 25	40.3	...	...							19	36 50	-12.61
2 39	39.7	...	...							20	35 96	.....

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	τ^3 Eridani	W	3.5	2 55 22.0	2 40.8	48.70	48.80	.....	297 6 15.30	+ 2.29	+11.26	-1 55.29	-23 59 46.65
		E	...	3 0 48.0	2 45.2	47.10	47.45	.....	62 52 50.22	+ 0.73	-11.88	+1 55.32	
2	ζ Eridani	E	3.5	3 8 11.0	2 52.9	47.55	47.55	.....	48 4 18.32	+ 1.01	-16.83	+1 5.96	- 9 10 15.66
		W	...	3 13 57.0	2 53.1	49.20	49.40	.....	311 54 49.90	+ 2.81	+16.87	-1 5.98	
3	2 H. Camelop.	W	3	3 18 27.0	2 49.3	48.85	49.00	.....	20 40 59.50	+ 2.44	-17.41	+ 22.41	+59 36 47.74
		E	...	3 23 42.0	2 25.7	46.90	46.90	.....	339 18 14.12	+ 0.40	+12.89	- 22.41	
4	11 H ¹ . Camelop.	E	2.5	3 31 16.0	2 32.9	47.80	47.70	.....	336 0 23.72	+ 1.22	+11.11	- 26.42	+62 54 43.95
		W	...	3 36 2.0	2 13.1	49.70	49.45	.....	23 58 42.90	+ 3.10	- 8.42	+ 26.42	
5	τ^6 Eridani	W	4	3 40 8.0	2 28.3	49.00	48.85	.....	297 34 12.65	+ 2.46	+ 9.65	-1 53.28	-23 31 49.19
		E	...	3 45 11.0	2 34.7	47.70	47.85	.....	62 24 59.35	+ 1.26	-10.50	+1 53.28	
6	December 18, L. δ^1 Aquarii	W	3	23 16 2.0	1 46.1	49.10	48.75	.....	300 28 52.40	+ 1.15	+ 5.19	-1 39.88	-20 36 58.97
		E	...	23 19 37.0	1 48.9	48.40	48.10	.....	59 30 15.42	+ 0.45	- 5.46	+1 39.91	
7	κ Andromedæ	E	2	23 36 .....	.....	48.80	48.10	27.503	355 4 11.22	+ 1.42	+ 0.32	- 5.08	+43 48 58.56
		W	...	.....	.....	49.50	49.40	27.503	4 51 24.32	+ 2.41	- 0.32	+ 5.08	
8	27 Piscium	E	2.5	23 51 3.0	2 35.1	49.00	48.35	.....	42 58 55.08	+ 0.90	-14.93	+ 55.09	- 4 4 44.04
		W	...	23 56 19.0	2 40.9	49.75	49.40	.....	317 0 11.72	+ 1.87	+16.07	- 55.11	
9	β Cassiopeiæ	W	2	0 1 2.0	2 54.9	49.70	49.05	.....	19 42 20.35	+ 1.60	-20.03	+ 21.20	+58 38 5.12
		E	...	0 6 35.0	2 38.1	48.60	48.20	.....	340 16 50.62	+ 0.62	+16.36	- 21.20	
10	ρ Andromedæ	E	2.5	0 16 .....	.....	48.95	48.50	25.713	1 27 15.10	+ 1.71	+ 0.26	+ 1.52	+37 27 0.29
		W	...	.....	.....	49.90	49.65	25.713	358 30 44.68	+ 2.75	- 0.26	- 1.52	
11	ν Andromedæ	W	3	0 45 .....	.....	49.60	49.45	25.465	1 38 1.80	+ 1.09	- 0.29	+ 1.71	+40 34 8.51
		E	...	.....	.....	48.75	48.60	25.465	358 20 22.08	+ 0.15	+ 0.29	- 1.71	
12	μ Cassiopeiæ	E	3	0 59 14.0	2 34.3	49.20	48.95	.....	344 27 1.65	+ 1.32	+21.92	- 16.48	+54 27 43.47
		W	...	1 4 19.0	2 30.7	50.15	49.95	.....	15 32 3.90	+ 2.35	-20.91	+ 16.49	
13	ξ Andromedæ	W	...	1 17 .....	.....	49.75	49.75	27.997	6 4 22.80	+ 1.24	- 0.34	+ 6.35	+45 2 17.11
		E	...	.....	.....	48.65	48.40	27.997	353 50 35.35	+ 0.01	+ 0.34	- 6.35	
14	γ Piscium	E	2.5	1 23 28.5	2 45.7	49.10	48.95	.....	24 3 13.78	+ 1.27	-27.62	+ 26.48	+14 51 39.26
		W	...	1 28 49.0	2 34.8	50.10	49.90	.....	335 55 58.98	+ 2.31	+24.11	- 26.50	
15	December 19, L. ω Piscium	E	3	23 51 28.5	2 47.0	51.05	49.70	.....	32 34 2.70	+ 1.76	-21.85	+ 37.90	+ 6 20 31.88
		W	...	23 56 50.0	2 34.5	51.00	49.60	.....	327 25 8.32	+ 1.63	+18.70	- 37.91	
16	β Cassiopeiæ	E	2.5	0 1 3.0	2 53.8	51.00	49.70	.....	340 16 46.90	+ 1.67	+19.77	- 21.28	+58 38 5.33
		W	...	0 6 33.0	2 36.2	51.00	49.70	.....	19 42 17.25	+ 1.64	-15.97	+ 21.28	
17	ρ Andromedæ	W	3	0 16 .....	.....	50.90	49.50	25.810	358 30 43.72	+ 0.78	- 0.26	- 1.52	+37 27 0.34
		E	...	.....	.....	50.95	49.50	25.810	1 27 12.95	+ 0.84	+ 0.26	+ 1.52	
18	π Andromedæ	E	2.5	0 32 .....	.....	51.00	49.60	28.083	5 40 21.70	+ 2.33	+ 0.22	+ 5.95	+33 12 12.95
		W	...	.....	.....	51.00	49.60	28.083	354 14 26.42	+ 2.33	- 0.22	- 5.95	
19	32 ² H. Camelop. S. P.	E	3	0 45 34.0	2 30.6	50.85	49.40	.....	302 51 37.90	+ 1.48	- 1.21	-1 31.76	+83 55 14.24
		W	...	0 50 50.0	2 45.4	50.85	49.50	.....	57 7 29.65	+ 1.52	+ 1.46	+ 31.77	
20	η Piscium	W	2	1 6 .....	.....	50.40	48.70	28.736	351 57 23.35	+ 0.16	- 0.20	- 8.35	+30 55 32.86
		E	...	.....	.....	50.70	49.30	28.736	7 56 33.62	+ 0.58	+ 0.20	+ 8.35	

Time	Ther- 38.5	Alt. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
11 2 58	49.5	41.0	29.934	7, 10, 18. Instrument in meridian, observation at I with movable thread.	1	359 59 16.98	.....
11 3 11	50.1	.....	.....	11, 13, 17, 20. Instrument in meridian, observation at IX with movable thread.	2	36.04	- 3.29
11 3 21	50.1	.....	.....		3	35.97	.....
11 3 34	48.6	.....	.....		4	36.82	-11.89
11 3 42	48.6	46.7	29.942		5	37.44	.....
11 3 58	48.6	40.2	29.954		6	34.59	9.65
11 4 9	47.2	.....	.....		7	35.16	10.40
11 4 19	47.2	.....	.....		8	35.14	.....
11 4 31	47.1	38.7	29.931		9	34.76	.....
11 4 46	47.0	.....	.....		10	34.51	27.27
11 4 57	46.2	.....	.....		11	34.82	.....
11 5 1	46.4	37.3	29.928		12	35.12	.....
11 5 15	46.4	.....	.....		13	35.15	-25.42
11 5 26	45.7	.....	.....		14	36.40	.....
11 5 42	45.7	32.0	29.912		15	35.62	.....
11 5 54	48.0	19.8	29.906		16	35.63	.....
11 6 4	47.9	.....	.....		17	35.60	-27.22
11 6 19	47.9	.....	.....		18	35.65	.....
11 6 29	47.9	.....	.....		19	35.40	.....
11 6 45	47.6	19.9	29.900		20	34.68	-22.55
11 7	47.7	.....	.....		

Notes.

4 E. One microscope reading increased 10".

11. Very faint, clouds.

12. Clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ξ Andromedæ	E W	2.5 ...	1 17 ... ... ..	... .. ... ..	50.70 50.80	49.25 49.30	27.970 27.970	353 50 35.05 6 4 24.15	+ 2.02 + 2.08	+ 0.34 - 0.34	- 6.37 + 6.37	+45 2 17.37
2	π Piscium	W E	3 ...	1 29 10.0 1 34 26.5	2 43.8 2 32.7	49.70 50.30	47.95 48.60	... .. ... ..	332 44 2.08 27 15 6.28	+ 0.17 + 0.77	+24.34 -21.15	- 30.65 + 30.67	+11 39 36.44
3	54 Ceti	E W	2.5 ...	1 43 13.0 1 48 24.5	2 26.7 2 44.8	50.75 50.60	49.40 49.15	... .. ... ..	28 19 59.35 331 39 3.50	+ 1.45 + 1.20	-18.91 +23.86	+ 32.16 - 32.18	+10 34 37.92
4	υ Ceti	W E	3 ...	1 52 32.0 1 58 2.5	2 49.5 2 41.0	50.25 51.05	48.60 49.50	... .. ... ..	299 33 37.50 60 25 30.22	+ 0.77 + 1.63	+13.03 -11.76	-1 44.81 +1 44.81	-21 32 12.44
5	θ Arietis	E W	2.5 ...	2 10 2.5 2 15 26.5	2 38.5 2 45.5	51.30 50.90	49.80 49.20	... .. ... ..	19 27 0.18 340 32 2.92	+ 1.89 + 1.43	-30.17 +32.89	+ 21.09 - 21.09	+19 27 58.34
6	υ Arietis	W E	2.5 ...	2 30 30.0 2 35 54.5	2 46.0 2 38.5	49.95 51.60	48.50 50.10	... .. ... ..	342 37 17.52 17 21 48.68	+ 0.54 + 2.24	+36.42 -33.21	- 18.69 + 18.70	+21 33 16.45
7	β Fornacis	E W	3 ...	2 42 4.0 2 47 31.0	2 52.7 2 34.3	51.60 50.80	50.00 49.10	... .. ... ..	71 40 20.32 288 18 47.68	+ 2.12 + 1.27	-11.20 + 8.94	+2 58.79 -2 58.78	-32 48 18.70
8	α Ceti	W E	2.5 ...	2 54 16.0 2 59 54.5	2 53.2 2 45.3	50.35 51.45	48.85 49.90	... .. ... ..	324 47 47.88 35 11 19.40	+ 0.96 + 2.03	+22.03 -20.07	- 42.13 + 42.11	+ 3 43 9.40
9	December 21, L. δ Andromedæ	E W	2.5 ...	0 34 ... ... ..	... .. ... ..	50.70 51.45	49.45 50.45	25.595 25.595	8 33 20.95 351 24 48.40	+ 2.01 + 2.89	+ 0.19 - 0.19	+ 8.63 - 8.63	+30 20 52.09
10	h Piscium	W E	3 ...	0 50 4.7 0 55 12.2	2 26.8 2 40.7	49.70 50.00	48.40 48.60	... .. ... ..	349 32 50.52 10 26 26.68	+ 0.21 + 0.47	+44.36 -53.15	- 10.56 + 10.57	+28 29 6.73
11	g Piscium	E W	3 ...	1 6 ... ... ..	... .. ... ..	50.45 50.85	48.95 49.60	25.773 25.773	7 58 33.88 351 59 21.72	+ 1.62 + 2.15	+ 0.20 - 0.20	+ 8.05 - 8.05	+30 55 32.69
12	α Ursæ Minoris	W E	3.5 ...	1 20 0.0 1 24 15.0	5 36.9 1 21.9	49.90 49.55	48.50 48.30	... .. ... ..	49 51 40.70 310 7 30.00	+ 0.38 + 0.10	- 1.31 + 0.08	+1 7.90 -1 7.92	+88 48 29.45
13	π Piscium	E W	3 ...	1 29 10.5 1 34 30.0	2 43.1 2 36.4	49.80 50.60	48.50 49.30	... .. ... ..	27 15 10.50 332 44 1.02	+ 0.33 + 1.15	-24.13 +22.19	+ 29.54 - 29.54	+11 39 36.04
14	54 Ceti	W E	3 ...	1 43 5.5 1 48 26.0	2 34.0 2 46.5	49.80 49.65	48.45 48.35	... .. ... ..	331 39 4.82 28 20 8.35	+ 0.30 + 0.19	+20.84 -24.36	- 30.92 + 30.92	+10 34 36.72
15	υ Ceti	E W	3 4	1 52 36.0 1 58 4.0	2 45.3 2 42.7	49.90 50.65	48.50 49.25	... .. ... ..	60 25 36.62 299 33 31.52	+ 0.38 + 1.15	-12.40 +12.01	+1 40.68 -1 40.64	-21 32 13.87
16	θ Arietis	W E	3.5 ...	2 10 4.0 2 15 16.5	2 36.7 2 35.8	49.55 49.50	48.25 48.15	... .. ... ..	340 32 6.45 19 27 2.52	+ 0.09 - 0.02	+29.49 -29.15	- 20.24 + 20.24	+19 27 57.85
17	41 Arietis	E W	2.5 ...	2 41 22.0 2 46 36.5	2 52.2 2 22.3	50.65 51.55	48.40 49.25	... .. ... ..	12 3 8.38 347 56 13.52	+ 1.17 + 2.08	-53.74 +36.71	+ 12.25 - 12.24	+26 52 22.75
18	α Ceti	E W	3 ...	2 54 18.0 2 59 33.0	2 51.0 2 24.0	50.00 51.30	47.85 49.15	... .. ... ..	35 11 23.30 324 47 50.52	+ 0.56 + 1.90	-21.48 +15.23	+ 40.41 - 40.42	+ 3 43 8.97
19	α Ursæ Minoris S. P.	W E	4 ...	13 18 30.0 13 22 40.0	7 6.5 2 56.5	52.35 48.90	50.65 46.85	... .. ... ..	52 14 27.22 307 44 40.38	+ 4.05 + 0.35	+ 2.03 - 0.35	+1 15.58 -1 15.58	+88 48 31.21
20	α Ursæ Minoris S. P.	E W	4 ...	13 26 50.0 13 31 30.0	1 13.5 5 53.5	50.15 51.05	48.35 48.95	... .. ... ..	307 44 37.15 52 14 28.38	+ 1.75 + 2.52	- 0.06 + 1.39	-1 15.58 +1 15.58	+88 48 30.95

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
19 1 20	37.6	...	...	1, 9, 11. Instrument in meridian, observation at I with movable thread.	1	359 59 36.20	-25.22
1 32	37.2	...	...		2	36.26	...
1 46	36.0	...	...		3	35.22	-13....
1 55	36.2	37.7	29.912		4	35.69	...
2 13	36.0	...	...		5	34.57	-14.22
2 33	35.5	...	...		6	36.10	...
2 45	35.2	36.8	29.913		7	34.57	...
2 57	35.7	...	...		8	36.10	...
3 9	...	36.8	29.920		9	34.68	...
21 0 32	49.3	50.7	29.502		10	34.55	-22.58
0 53	48.9	...	...		11	34.52	-22.48
1 4	48.6	...	...		12	34.96	...
1 23	48.6	...	...		13	35.53	...
1 32	48.6	49.8	29.510		14	35.07	-13.52
1 46	48.6	...	...	Note. 8, 16. Clouds.	15	34.66	...
1 55	49.2	...	...		16	34.69	-14.13
2 13	49.3	...	...		17	34.06	...
2 44	49.1	49.9	29.532		18	35.01	...
2 57	48.9	...	...		19	36.84	...
13 17	41.9	42.2	29.743		20	35.56	...
13 32	41.8	42.9	29.745				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	December 29, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P.	E	3.5	13 18 40.0	6 48.0	48.90	48.15	.....	307 44 43.82	+ 0.31	- 1.85	- 1 15.91	+88 48 32.63
		W	...	13 22 50.0	2 38.0	50.80	50.45	.....	52 14 29.02	+ 2.44	+ 0.28	+ 1 15.91	
2	α Ursæ Minoris S. P.	W	3.5	13 26 55.0	1 27.0	50.70	50.20	.....	52 14 29.98	+ 2.26	+ 0.08	+ 1 15.93	+88 48 32.33
		E	...	13 31 35.0	6 7.0	49.25	48.75	.....	307 44 43.02	+ 0.79	- 1.50	- 1 15.93	
	December 30, L.												
3	α Ursæ Minoris	E	4	1 18 55.0	6 32.5	50.40	50.30	.....	310 7 28.65	+ 0.39	+ 1.77	- 1 9.54	+88 48 30.62
		W	...	1 23 0.0	2 27.5	50.65	50.85	.....	49 51 38.95	+ 0.81	- 0.25	+ 1 9.55	
4	α Ursæ Minoris	W	4	1 26 50.0	1 22.5	50.45	50.50	.....	49 51 30.48	+ 0.52	- 0.08	+ 1 9.57	+88 48 31.00
		E	...	1 30 50.0	5 22.5	50.20	50.10	.....	310 7 29.12	+ 0.18	+ 1.20	- 1 9.57	
5	τ Ceti	E	3.5	1 36 42.0	2 45.6	50.60	50.60	.....	55 19 48.28	+ 0.65	- 13.57	+ 1 24.78	- 16 26 8.96
		W	...	1 42 5.0	2 37.4	50.55	50.85	.....	304 39 20.58	+ 0.75	+ 12.26	- 1 24.80	
6	β Trianguli	E	3	2 4 ....	.....	51.00	51.10	26.020	4 21 23.72	+ 1.83	+ 0.23	+ 4.50	+ 34 32 37.02
		W	...	.....	.....	51.15	51.15	26.020	355 36 13.65	+ 1.96	- 0.23	- 4.50	
7	σ Ceti	W	3.5	2 11 27.0	2 54.7	50.35	50.40	.....	317 40 28.62	+ 0.39	+ 19.20	- 53.54	- 3 24 24.07
		E	...	2 17 8.0	2 46.3	50.70	50.80	.....	42 18 39.30	+ 0.78	- 17.40	+ 53.57	
8	ν Arietis	E	3	2 30 22.5	2 52.2	50.95	51.05	.....	17 21 54.92	+ 1.07	- 39.20	+ 18.42	+ 21 33 16.41
		W	...	2 35 42.0	2 27.3	50.95	51.10	.....	342 37 23.25	+ 1.08	+ 28.68	- 18.42	
9	π Eridani	W	3.5	2 43 38.0	2 54.4	50.05	50.00	.....	299 42 4.22	+ 0.08	+ 13.83	- 1 42.90	- 21 23 42.78
		E	...	2 49 9.0	2 36.6	50.65	50.70	.....	60 17 1.75	+ 0.71	- 11.15	+ 1 42.93	
10	γ Persei	E	3	2 54 50.0	2 55.7	51.00	51.25	.....	345 46 10.52	+ 1.20	+ 31.99	- 14.94	+ 53 8 23.30
		W	...	3 0 16.0	2 30.3	51.00	51.25	.....	14 12 49.22	+ 1.17	- 23.40	+ 14.95	
11	κ Ceti	W	3.5	3 11 13.0	2 59.0	50.80	50.80	.....	324 6 2.52	+ 0.86	+ 23.15	- 42.70	+ 3 1 24.31
		E	...	3 16 45.0	2 33.0	50.90	51.20	.....	35 53 1.78	+ 1.09	- 16.92	+ 42.70	
12	f Tauri	E	3.5	3 22 33.0	2 54.2	51.45	51.40	.....	26 18 1.70	+ 1.50	- 28.35	+ 29.19	+ 12 36 48.00
		W	...	3 28 4.0	2 36.8	51.70	51.60	.....	333 41 11.12	+ 1.72	+ 22.97	- 29.20	
13	17 Tauri	W	3	3 36 21.0	2 42.9	49.95	48.65	.....	344 52 57.55	- 0.69	+ 39.52	- 15.98	+ 23 49 1.89
		E	...	3 41 48.0	2 44.1	50.65	49.60	.....	15 6 13.98	+ 0.19	- 40.10	+ 15.99	

Time.	Ther. 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1905.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
29 13 18	36.4	37.9	29.528	6. Instrument in meridian, observation at I with movable thread.	1	359 59 37.01	.....
13 32	36.2	37.9	29.532		2	37.33	.....
30 1 18	40.9	42.0	29.738		3	35.16	.....
1 39	40.5	.....	.....		4	35.41	.....
1 49	40.2	.....	.....		5	34.46	.....
2 7	40.2	.....	.....		6	35.50	.....
2 16	39.8	40.9	29.749		7	35.46	.....
2 33	39.7	.....	.....		8	34.90	.....
2 40	39.5	.....	.....		9	34.74	.....
2 58	39.2	40.3	29.754		10	36.46	.....
3 14	38.6	.....	.....		11	36.34	- 4.26
3 26	38.6	.....	.....		12	36.33	.....
3 40	37.5	39.4	29.773		13	36.23	- 7.30

No.	Date, observer, and object.	Circle.	Sec-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
	January 1, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P.	W E	2 ...	13 18 10.0 13 22 55.0	7 14.6 2 29.6	51.20 51.50	49.95 50.25	.....	52 14 24.00 307 44 44.08	+ 0.71 + 1.02	+ 2.10 - 0.25	+1 18.92 -1 18.94	+88 48 33.37
2	α Ursæ Minoris S. P.	E W	2 ...	13 26 35.0 13 31 15.0	1 10.4 5 50.4	51.40 50.85	50.15 49.90	.....	307 44 43.40 52 14 24.95	+ 0.92 + 0.49	- 0.06 + 1.37	-1 18.96 +1 18.96	+88 48 33.04
3	January 5, L. α Ursæ Minoris	E W	2.5 ...	1 18 46.0 1 23 46.0	6 34.6 1 34.6	48.65 50.20	48.95 50.50	.....	310 7 28.08 49 51 39.60	+ 0.34 + 1.92	+ 1.80 - 0.10	-1 8.90 +1 8.90	+88 48 31.21
4	α Ursæ Minoris	W E	2.5 ...	1 27 50.0 1 33 40.0	2 29.4 8 19.4	40.75 48.85	49.90 48.85	.....	49 51 39.92 310 7 27.30	+ 1.38 + 0.39	- 0.26 + 2.88	+1 8.93 -1 8.94	+88 48 30.88
5	σ Ceti	E W	3 ...	2 11 43.5 2 17 1.0	2 37.4 2 40.1	49.10 50.15	49.15 50.15	.....	42 18 38.38 317 40 29.10	+ 0.65 + 1.70	-15.58 +16.12	+ 53.10 - 53.10	- 3 24 24.65
6	σ Ceti	W E	3 ...	2 24 57.0 2 30 4.0	2 26.0 2 41.0	48.90 48.65	49.00 48.85	.....	305 25 50.78 54 33 23.28	+ 0.50 + 0.29	+10.69 -13.00	-1 21.79 +1 21.79	-15 39 39.38
7	35 Arietis	W E	2.5 ...	2 35 6.5 2 40 12.7	2 34.9 2 31.3	49.55 48.80	49.75 49.05	.....	348 22 11.65 11 36 56.80	+ 1.22 + 0.46	+44.92 -42.86	- 12.00 + 12.00	+27 18 26.41
8	τ^2 Eridani	E W	3 ...	2 44 0.0 2 49 23.0	2 31.6 2 51.4	49.30 50.55	49.30 50.95	.....	60 17 3.85 299 42 1.75	+ 0.84 + 2.34	-10.45 +13.36	+1 42.02 -1 42.08	-21 23 43.73
9	γ Persei	W E	3 ...	2 54 56.5 3 0 24.0	2 48.5 2 39.0	50.15 49.00	50.30 49.15	.....	14 12 55.65 345 46 16.40	+ 1.78 + 0.64	-29.42 +26.19	+ 14.82 - 14.82	+53 8 23.92
10	κ Ceti	E W	3 ...	3 11 21.5 3 16 32.0	2 49.7 2 20.8	49.35 51.00	49.65 51.10	.....	35 53 6.15 324 6 8.80	+ 1.04 + 2.65	-20.81 +14.33	+ 42.33 - 42.33	+ 3 1 24.08
11	f Tauri	W E	3 ...	3 22 43.0 3 27 56.0	2 43.4 2 29.6	49.90 49.05	50.10 49.35	.....	333 41 8.95 26 17 56.90	+ 1.55 + 0.76	+24.95 -20.91	- 28.94 + 28.95	+12 36 47.11
12	17 Tauri	E W	2.5 ...	3 36 14.5 3 41 32.3	2 48.6 2 29.2	49.80 50.80	49.80 50.95	.....	15 6 15.60 344 53 1.60	+ 1.34 + 2.45	-42.32 +33.16	+ 15.82 - 15.82	+23 49 2.19
13	γ Eridani	W E	3.5 ...	3 50 36.0 3 56 5.0	2 48.2 2 40.8	49.40 49.05	49.65 49.35	.....	307 18 34.28 52 40 33.98	+ 1.06 + 0.73	+14.66 -13.39	-1 16.74 +1 16.75	-13 46 45.69
14	43 Tauri	E W	3 ...	4 0 55.5 4 6 23.0	2 31.5 2 56.0	49.65 50.75	46.55 47.95	.....	19 33 23.80 340 25 34.92	- 0.35 + 0.92	-27.44 +37.03	+ 20.84 - 20.85	+19 21 34.29
15	ν^4 Eridani	W E	4 ...	4 11 26.0 4 17 0.0	2 40.0 2 54.0	50.20 49.50	49.55 48.70	.....	287 5 21.35 72 53 50.48	+ 1.45 + 0.66	+ 9.42 -11.14	-3 8.52 +3 8.55	-34 1 55.71
16	m Persei	E W	2.5 ...	4 27 ..... .....	..... .....	49.50 51.05	49.15 50.45	25.933 25.933	356 2 25.68 3 55 18.35	+ 1.59 + 3.07	+ 0.31 - 0.31	- 4.04 + 4.04	+42 51 47.51
17	τ Tauri	W E	3 ...	4 33 33.5 4 39 7.5	2 48.4 2 45.6	49.80 49.45	49.35 48.70	.....	343 50 27.12 16 8 41.35	+ 1.12 + 0.61	+39.99 -38.67	- 17.00 + 17.00	+22 46 32.18
18	January 6, L. α Ursæ Minoris	E W	3 ...	1 22 25.0 1 27 30.0	2 54.6 2 10.4	50.75 50.85	50.35 50.25	.....	310 7 28.90 49 51 37.68	+ 1.51 + 1.51	+ 0.35 - 0.20	-1 10.48 +1 10.48	+88 48 31.30
19	τ Ceti	W E	3 ...	1 36 28.0 1 41 53.0	2 58.7 2 26.3	50.00 50.30	49.35 49.75	.....	304 39 17.60 55 19 45.28	+ 0.62 + 0.99	+15.80 -10.59	-1 25.90 +1 25.92	-16 26 10.04
20	γ Arietis (<i>s. star</i>)	E W	3 ...	1 45 26.0 1 50 32.5	2 41.2 2 25.3	50.45 50.80	49.85 50.15	.....	20 5 2.40 339 54 10.92	+ 1.10 + 1.45	-30.37 +24.68	+ 21.79 - 21.80	+18 49 56.86

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
1 13 16	28.7	30.3	30.196	16. Instrument in meridian, observation at I with movable thread.					1	359 59 35.82	.....
13 34	28.4	30.3	30.194						2	35.54	.....
5 1 20	42.2	.....	.....						3	35.82	.....
1 39	41.9	43.3	29.550						4	35.80	.....
2 15	40.7	.....	.....						5	35.18	.....
2 28	41.2	.....	.....						6	36.27	.....
2 39	41.1	42.2	29.562						7	36.10	+1.34
2 46	40.4	.....	.....						8	35.82	.....
2 58	40.2	.....	.....						9	35.62	.....
3 15	39.8	.....	.....						10	36.08	+9.59
3 26	39.6	40.9	29.576						11	36.10	.....
3 39	39.3	.....	.....						12	35.92	+4.41
3 54	39.3	.....	.....						13	35.66	.....
4 4	38.8	.....	.....						14	34.44	.....
4 15	38.9	.....	.....						15	36.12	.....
4 24	38.5	.....	.....						16	35.72	.....
4 37	38.6	39.8	29.584						17	35.76	.....
6 1 25	36.7	.....	37.4						18	34.88	.....
1 39	36.7	.....	.....						19	34.86	.....
1 49	36.4	.....	.....						20	35.08	+2.57

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Arietis	W E	3	1 58 46.5 2 4 18.5	2 50.9 2 41.1	49.85 50.00	49.00 49.30	.....	344 4 58.40 15 54 8.18	+ 0.35 + 0.60	+41.61 -36.97	- 16.99 + 17.00	+23 1 3.98
2	σ Ceti	E W	3	2 24 57.0 2 30 8.0	2 25.8 2 45.2	50.75 50.85	50.00 50.00	.....	54 33 17.25 305 25 47.90	+ 1.33 + 1.39	-10.66 +13.68	+1 23.66 -1 23.70	-15 39 39.46
3	γ Ceti	W E	3	2 35 22.5 2 40 44.0	2 48.3 2 33.2	50.20 50.35	49.20 49.45	.....	323 54 56.83 36 4 11.10	+ 0.64 + 0.86	+20.33 -16.89	- 43.47 + 43.47	+ 2 50 14.64
4	λ Ceti	E W	3	2 51 40.5 2 57 3.0	2 45.2 2 37.3	50.65 50.90	49.80 49.90	.....	30 22 47.82 329 36 22.80	+ 1.17 + 1.34	-22.64 +20.53	+ 34.99 - 35.00	+ 8 31 50.86
5	ζ Arietis	W E	2.5	3 6 28.3 3 11 48.0	2 46.8 2 32.9	49.70 50.20	48.90 49.25	.....	341 45 46.08 18 13 18.05	+ 0.24 + 0.63	+35.30 -29.66	- 19.67 + 19.68	+20 41 42.80
6	δ Tauri	E W	3	3 22 9.0 3 27 27.0	2 52.5 2 25.5	50.45 50.60	49.40 49.70	.....	27 54 1.62 332 5 15.32	+ 0.89 + 1.10	-26.48 +18.85	+ 31.62 - 31.63	+11 0 44.70
7	13 H ^l . Camelop.	W E	3	3 32 30.0 3 36 56.0	4 23.9 0 2.1	50.20 50.10	49.15 49.10	.....	27 58 42.18 332 0 52.68	+ 0.61 + 0.53	-24.69 + 0.00	+ 31.73 - 31.72	+66 54 30.87
8	27 Tauri	E W	3	3 40 38.7 3 46 7.5	2 41.1 2 47.7	50.20 50.50	49.15 49.50	.....	15 9 17.52 344 49 46.38	+ 0.63 + 0.96	-38.54 +41.75	+ 16.19 - 16.20	+23 45 55.24
9	January 9, L. α Ursæ Minoris s. P.	E W	2	13 20 24.0 13 24 10.0	4 51.8 1 5.8	51.40 51.65	49.50 49.70	.....	307 44 47.62 52 14 23.98	+ 0.48 + 0.70	- 0.95 + 0.05	-1 20.82 +1 20.84	+88 48 33.69
10	α Ursæ Minoris s. P.	W E	2	13 27 10.0 13 30 58.0	1 54.2 5 42.2	51.85 51.50	49.70 49.40	.....	52 14 23.38 307 44 49.08	+ 0.80 + 0.48	+ 0.14 - 1.30	+1 20.84 -1 20.84	+88 48 34.44
11	January 10, L. α Ursæ Minoris	E W	3	1 18 30.0 1 22 45.0	6 45.2 2 30.2	50.85 51.50	49.55 50.05	.....	310 7 29.40 49 51 37.42	+ 1.05 + 1.65	+ 1.89 - 0.26	-1 11.93 +1 11.94	+88 48 31.86
12	α Ursæ Minoris	W E	3	1 27 5.0 1 31 10.0	1 49.8 5 44.8	51.50 50.95	50.00 49.20	.....	49 51 38.25 310 7 30.38	+ 1.62 + 0.93	- 0.14 + 1.45	+1 11.96 -1 11.96	+88 48 32.13
13	σ Piscium	E W	3	1 37 21.0 1 42 28.5	2 49.0 2 18.5	50.95 51.60	49.45 50.00	.....	30 13 40.25 329 45 37.05	+ 1.07 + 1.68	-23.79 +15.98	+ 35.42 - 35.42	+ 8 40 59.86
14	γ Arietis (<i>s. star</i>)	W E	3	1 45 39.0 1 50 29.0	2 27.7 2 22.3	51.10 50.90	49.55 49.40	.....	339 54 12.40 20 4 56.62	+ 1.20 + 0.99	+25.51 -23.67	- 22.24 + 22.24	+18 49 57.03
15	γ Trianguli	E W	2.5	2 12 ..... .....	..... .....	50.90 51.55	49.35 50.00	25.998 25.998	5 29 12.35 354 28 26.82	+ 1.71 + 2.35	+ 0.22 - 0.22	+ 5.87 - 5.87	+33 24 48.15
16	5 Ursæ Minoris s. P.	W E	3.5 4	2 25 20.0 2 30 25.0	2 4.0 3 1.0	51.05 50.95	49.40 49.40	.....	64 55 28.50 295 3 43.55	+ 1.08 + 1.04	+ 1.73 - 3.68	+2 9.57 -2 9.58	+76 6 38.53
17	γ Ceti	E W	3.5	2 35 27.0 2 40 47.0	2 43.3 2 36.7	50.85 51.15	49.45 49.45	.....	36 4 11.58 323 55 0.92	+ 1.02 + 1.15	-19.19 +17.67	+ 44.35 - 44.34	+ 2 50 15.51
18	τ^3 Eridani	W E	4	2 55 12.0 3 0 28.0	2 47.5 2 28.5	50.15 51.00	48.40 49.45	.....	297 6 13.45 62 52 53.70	+ 0.13 + 1.07	+12.21 - 9.60	-1 58.43 +1 58.44	-23 59 51.43
19	ζ Arietis	E W	3.5	3 6 28.0 3 11 51.0	2 46.6 2 36.4	51.35 50.85	49.50 49.05	.....	18 13 23.68 341 45 51.35	+ 1.28 + 0.81	-35.22 +31.04	+ 20.06 - 20.06	+20 41 43.30
20	f Tauri	W E	3	3 22 38.5 3 28 5.0	2 47.3 2 39.2	50.05 51.05	48.25 49.45	.....	333 41 10.48 26 17 58.28	- 0.02 + 1.12	+26.15 -23.68	- 30.13 + 30.13	+12 36 47.01

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>				
5 2 2	36.0	37.1	29.884	15. Instrument in meridian, observation at I with movable thread.	1	359 59 36.00	
2 28	36.7	.....	.....		2	35 42	
2 35	36.7	.....	.....		3	36.48	
2 44	36.7	36.5	29.898		4	35 50	+ 7.97
3 9	35.4	.....	.....		5	35.85	
3 25	35.6	.....	.....		6	35.64	+ 2.61
3 44	35.7	36.4	29.920		7	35.66	-4.99
9 11 21	17.1	.....	.....		8	34.44	+4.47
11 11	17.0	18.0	30.162		9	35.95	
12 1 15	32.3	34.0	30.198		10	36.20	
1 32	32.9	.....	.....		11	35.58	
1 40	31.8	.....	.....		12	36.24	
1 49	31.7	.....	.....		13	36.12	
2 10	31.4	33.9	30.206		14	36.53	+ 2.70
2 29	31.0	.....	.....		15	35.64	
2 34	31.3	.....	.....		16	36.10	
2 44	31.4	32.3	30.211		17	36.68	
3 10	31.3	.....	.....		18	35.48	
3 26	30.7	.....	.....		19	36.47	
					20	36.16	

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	13 H ¹ . Camelop.	E W	3.5 ...	3 34 7.0 3 39 40.0	2 46.3 2 46.7	51.15 51.00	49.45 49.40	..... .....	332 0 42.88 27 58 29.00	+ 1.15 + 1.03	+ 9.81 - 9.86	- 32.36 + 32.35	+66 54 32.21
2	January 16, L. Andromedæ	W E	3 ...	0 34 ..... .....	..... .....	47.20 49.00	47.50 49.40	27.762 27.762	351 23 22.88 8 31 55.85	+ 0.17 + 2.07	- 0.19 + 0.19	- 8.66 + 8.66	+30 20 50.39
3	τ Piscium	E W	3 ...	1 6 ..... .....	..... .....	49.60 48.25	49.70 48.10	25.898 25.898	9 18 30.32 350 39 14.05	+ 3.97 + 2.47	+ 0.19 - 0.19	+ 9.46 - 9.46	+29 35 28.13
4	α Ursæ Minoris	W E	3 ...	1 18 10.0 1 22 30.0	6 45.7 2 25.7	46.90 48.90	47.00 48.85	..... .....	49 51 45.40 310 7 27.55	+ 0.50 + 2.46	- 1.89 + 0.24	+ 8.23 - 8.26	+88 48 31.79
5	α Ursæ Minoris	E W	3 ...	1 26 20.0 1 30 0.0	1 24.3 5 4.3	48.90 47.70	48.80 47.25	..... .....	310 7 27.12 49 51 42.90	+ 2.43 + 1.05	+ 0.08 - 1.06	- 8.28 + 8.30	+88 48 31.59
6	ν Persei	W E	2 ...	3 39 ..... .....	..... .....	46.70 48.40	46.55 48.50	27.607 27.607	3 19 24.52 356 36 10.52	- 0.57 + 1.31	- 0.30 + 0.30	+ 3.42 - 3.42	+42 16 55.85
7	γ Eridani	E W	3.5 ...	3 50 44.0 3 57 2.0	2 26.8 3 51.2	51.35 50.05	51.25 49.80	..... .....	52 40 31.38 307 18 20.85	+ 3.54 + 2.17	- 11.16 + 27.69	+ 16.31 - 16.33	-13 46 46.17
8	δ ⁴ Eridani	E W	4 ...	4 11 8.0 4 16 30.0	2 44.6 2 37.4	50.85 49.55	50.45 49.00	..... .....	72 53 54.52 287 5 20.38	+ 2.91 + 1.49	- 9.96 + 9.11	+ 7.47 - 7.46	-34 1 59.04
9	ρ Tauri	W E	3 ...	4 25 18.0 4 30 30.0	2 45.1 2 26.9	48.35 50.85	48.05 50.70	..... .....	335 43 4.08 24 16 5.32	+ 0.38 + 3.05	+ 27.22 - 21.55	- 26.30 + 26.30	+14 38 42.80
10	τ Tauri	E W	2.5 ...	4 33 35.5 4 38 42.5	2 33.1 2 33.9	51.10 50.10	50.85 49.85	..... .....	16 8 35.45 343 50 34.12	+ 3.21 + 2.19	- 33.05 + 33.40	+ 16.90 - 16.91	+22 46 31.81
11	α Ursæ Minoris s. p.	E W	2.5 ...	13 18 10.0 13 22 40.0	6 45.2 2 15.2	50.95 50.40	50.35 49.65	..... .....	307 44 45.82 52 14 28.38	+ 1.05 + 0.40	- 1.82 + 0.20	- 16.93 + 16.97	+88 48 34.41
12	α Ursæ Minoris s. p.	W E	2.5 ...	13 26 35.0 13 31 10.0	1 39.8 6 14.8	50.45 50.85	49.50 50.30	..... .....	52 14 29.32 307 44 46.02	+ 0.34 + 0.96	+ 0.11 - 1.56	+ 17.00 - 17.00	+88 48 34.15
13	January 18, L. α Ursæ Minoris	W E	2.5 ...	1 18 0.0 1 22 25.0	6 53.9 2 28.9	50.55 51.85	50.40 51.85	..... .....	49 51 45.00 310 7 26.05	+ 1.63 + 3.03	- 1.97 + 0.26	+ 7.89 - 7.94	+88 48 32.25
14	α Ursæ Minoris	E W	2.5 ...	1 26 10.0 1 30 40.0	1 16.1 5 46.1	51.75 50.35	51.65 50.35	..... .....	310 7 26.18 49 51 44.32	+ 2.88 + 1.49	+ 0.07 - 1.38	- 7.94 + 7.94	+88 48 32.26
15	ο Piscium	W E	3 ...	1 37 5.0 1 42 13.5	2 52.0 2 16.5	49.95 51.95	49.60 51.80	..... .....	329 45 29.65 30 13 34.65	+ 0.92 + 3.06	+ 24.64 - 15.52	- 33.44 + 33.44	+ 8 40 59.74
16	γ Andromedæ	E W	2.5 ...	1 58 ..... .....	..... .....	52.00 50.35	52.05 50.35	24.447 24.447	357 2 23.88 2 57 23.25	+ 3.92 + 2.21	+ 0.30 - 0.30	- 2.97 + 2.97	+41 52 48.17
17	κ Fornacis	W E	3.5 ...	2 15 0.0 2 20 24.0	2 45.8 2 38.2	49.20 52.05	49.20 51.90	..... .....	296 51 8.78 63 7 59.88	+ 0.31 + 3.17	+ 11.92 - 10.85	- 53.03 + 53.10	-24 14 51.99
18	35 Arietis	E W	2.5 ...	2 34 31.8 2 39 39.5	2 55.9 2 11.8	52.55 50.55	52.15 50.45	..... .....	11 37 9.00 348 22 23.28	+ 3.54 + 1.62	- 57.92 + 32.53	+ 11.86 - 11.86	+27 18 26.21
19	ν Persei	E W	2.5 ...	3 39 ..... .....	..... .....	52.50 49.95	52.25 49.80	27.525 27.525	356 36 9.62 3 19 25.55	+ 4.32 + 1.74	+ 0.30 - 0.30	- 3.40 + 3.40	+42 16 56.45
20	174 G. Eridani	W E	3.5 ...	3 58 24.0 4 3 52.0	2 53.0 2 35.0	48.50 51.85	48.30 51.75	..... .....	293 11 32.80 66 47 34.62	- 0.50 + 2.99	+ 12.21 - 9.80	- 2 14.38 + 2 14.38	-27 54 49.36

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
10 3 37	31.3	32.2	30.219	2, 6. Instrument in meridian, observation at IX with movable thread.							1	389 59 37.00	5.71
16 0 29	47.6	49.3	29.472	3, 16, 19. Instrument in meridian, observations at I with movable thread.							2	36.54	.....
1 4	46.2	.....	.....								3	36.34	- 1.69
1 16	45.9	.....	.....								4	37.12	.....
1 31	45.5	46.9	29.493								5	36.27	.....
3 37	41.5	42.9	29.532								6	37.61	.....
3 53	41.2	.....	.....								7	37.22	.....
4 14	40.8	.....	.....								8	39.23	.....
4 28	40.9	.....	.....								9	39.25	+ 7.89
4 36	40.6	42.4	29.541								10	37.66	.....
13 17	32.7	34.0	29.694								11	37.04	.....
13 32	32.1	.....	.....								12	37.60	.....
13 46	.....	34.2	29.701								13	36.98	.....
18 1 16	47.6	48.9	29.450	Notes.							14	36.78	.....
1 34	47.3	.....	.....	1 E. One microscope reading decreased 10".							15	38.70	.....
1 40	47.2	.....	.....	7, 9. Clouds.							16	37.42	.....
1 56	47.3	.....	.....								17	36.64	.....
2 18	46.6	47.6	29.475								18	36.02	+ 1.54
2 38	45.2	.....	.....								19	36.98	.....
3 33	43.9	45.1	29.483								20	36.16	+ 19.22

No.	Date, observer, and object.	Circle.	See-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	68 Tauri	E	2.5	4 16 44.7	2 50.4	52.15	51.90	.....	21 12 18.40	+ 3.18	-32.44	+ 22.48	+17 42 40.99
		W	...	4 22 4.0	2 28.9	50.00	49.50	.....	338 46 57.08	+ 0.87	+24.77	- 22.47	
2	α Ursæ Minoris S. P.	E	3.5	13 18 20.0	7 6.0	50.85	50.40	.....	307 44 45.20	+ 0.40	- 2.02	-1 16.72	+88 48 34.15
		W	...	13 22 45.0	2 41.0	50.85	50.40	.....	52 14 27.78	+ 0.39	+ 0.29	+1 16.77	
3	α Ursæ Minoris S. P.	W	3.5	13 26 20.0	0 54.0	51.15	50.45	.....	52 14 27.75	+ 0.58	+ 0.03	+1 16.81	+88 48 34.59
	January 24. L.	E	...	13 31 20.0	5 54.0	50.85	50.45	.....	307 44 45.48	+ 0.43	- 1.39	-1 16.82	
4	α Ursæ Minoris	W	2.5	1 18 0.0	7 20.4	53.10	53.00	.....	49 51 41.58	+ 1.64	- 2.23	+1 10.65	+88 48 32.41
		E	...	1 22 50.0	2 30.4	52.50	52.50	.....	310 7 29.48	+ 1.06	+ 0.26	-1 10.68	
5	α Ursæ Minoris	E	2.5	1 26 40.0	1 19.6	52.40	52.50	.....	310 7 29.80	+ 1.01	+ 0.07	-1 10.71	+88 48 32.13
		W	...	1 31 10.0	5 49.6	52.65	52.65	.....	49 51 40.58	+ 1.22	- 1.41	+1 10.74	
6	γ Andromedæ	W	2	1 58 .....	.....	51.50	51.65	27.513	2 55 19.65	- 0.63	- 0.30	+ 3.09	+41 52 47.79
		E	...	.....	.....	52.30	52.40	27.513	357 0 22.20	+ 0.13	+ 0.30	- 3.09	
7	γ Tauri	E	2.5	3 39 5.0	2 53.5	50.00	47.50	.....	15 6 28.90	+ 2.26	-44.81	+ 16.30	+23 48 50.29
		W	...	3 44 31.5	2 33.0	49.50	46.15	.....	344 52 50.02	+ 1.35	+34.86	- 16.30	
8	43 Tauri	W	2.5	4 1 9.5	2 36.7	48.25	49.40	.....	340 25 46.65	+ 0.35	+29.36	- 21.47	+19 21 34.65
		E	...	4 6 15.5	2 29.3	49.50	50.55	.....	19 33 22.50	+ 1.56	-26.64	+ 21.48	
9	212 G. Eridani	E	3.5	4 13 50.0	2 47.8	49.65	50.65	.....	59 45 26.70	+ 1.70	-12.92	+1 43.43	-20 52 5.33
		W	...	4 19 15.0	2 37.2	49.20	50.40	.....	300 13 45.72	+ 1.35	+11.34	-1 43.45	
10	ρ Tauri	E	2.5	4 25 40.0	2 46.8	49.40	50.50	.....	24 16 9.68	+ 1.52	-27.78	+ 27.29	+14 38 41.98
		W	...	4 31 15.0	2 39.2	49.10	50.20	.....	335 43 2.20	+ 1.16	+25.31	- 27.30	
11	α Ursæ Minoris S. P.	E	2.5	13 18 20.0	6 59.8	49.10	49.70	.....	307 44 48.00	+ 0.79	- 1.06	-1 19.32	+88 48 34.45
		W	...	13 23 0.0	2 19.8	49.95	50.00	.....	52 14 24.35	+ 1.38	+ 0.22	+1 19.36	
12	α Ursæ Minoris S. P.	W	2.5	13 26 40.0	1 20.2	49.75	49.90	.....	52 14 24.55	+ 1.22	+ 0.07	+1 19.38	+88 48 34.57
	January 28. L.	E	...	13 31 15.0	5 55.2	48.95	49.25	.....	307 44 47.95	+ 0.49	- 1.40	-1 19.38	
13	γ Tauri	W	2.5	3 39 8.5	2 50.1	46.90	47.90	.....	344 52 44.02	+ 0.52	+43.07	- 15.70	+23 48 49.14
		E	...	3 44 9.0	2 10.4	50.05	51.00	.....	15 6 12.75	+ 3.78	-25.32	+ 15.70	
14	ρ Tauri	E	2.5	4 2 24.5	2 46.8	49.35	49.05	.....	12 41 19.70	+ 2.40	-48.19	+ 13.14	+26 14 5.85
		W	...	4 7 47.0	2 35.7	49.50	49.25	.....	347 17 54.00	+ 2.60	+42.01	- 13.14	
15	212 G. Eridani	W	3.5	4 13 39.0	2 58.9	48.25	48.15	.....	300 13 38.30	+ 1.38	+14.69	-1 39.83	-20 52 6.52
		E	...	4 19 22.0	2 44.1	48.35	48.30	.....	59 45 31.80	+ 1.51	-12.35	+1 39.80	
16	α Tauri	E	3	4 27 43.0	2 53.6	48.85	48.80	.....	22 35 52.82	+ 2.05	-31.93	+ 24.34	+16 19 6.87
	January 20. L.	W	...	4 33 14.5	2 37.9	49.20	49.05	.....	337 23 23.35	+ 2.32	+26.42	- 24.35	
17	α Ursæ Minoris	W	2	1 18 30.0	6 44.8	48.25	48.70	.....	49 51 43.70	+ 1.41	- 1.88	+1 9.31	+88 48 31.84
		E	...	1 22 40.0	2 34.8	48.00	48.10	.....	310 7 30.22	+ 0.97	+ 0.28	-1 9.34	
18	α Ursæ Minoris	E	2	1 26 54.0	1 39.2	47.85	48.05	.....	310 7 30.48	+ 0.87	+ 0.11	-1 9.38	+88 48 32.06
		W	...	1 31 20.0	6 5.2	48.45	48.80	.....	49 51 43.45	+ 1.57	- 1.53	+1 9.42	
19	41 Arietis	W	2.5	2 41 34.7	2 56.8	47.35	47.70	.....	347 56 0.35	+ 0.45	+56.65	- 12.62	+26 52 23.05
		E	...	2 46 44.0	2 12.5	48.50	48.95	.....	12 2 49.58	+ 1.64	-31.83	+ 12.62	

Time	Ther. 1906.	Alt ther.	Barom	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1906.0.
<i>h m s</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
18 4 1	41.1		29.488	6. Instrument in meridian, observation at IX with movable thread.	1	359 59 35.94	+ 7.02
4 19	41.4	44.8	29.488		2	36.04	
11 15	41.0	44.3	29.488		3	36.44	
11 17	40.2	43.7	29.442		4	35.88	
24 1 15	40.9	42.1	29.414		5	35.66	
1 16	40.0				6	36.66	
1 16	39.2	40.7	29.413		7	36.29	
1 18	39.1	40.8	29.413		8	36.90	
4 4	40.1				9	36.94	+ 18.09
4 17	40.1				10	36.04	+ 8.16
4 29	44.7	46.6	29.406		11	36.41	
11 15	40.3	40.6	29.428		12	36.44	
11 14	27.8				13	39.47	
11 47	40.1	40.1	29.426		14	36.26	+ 4.10
28 4 42	42.6	44.7	29.554	8 E. One microscope reading increased to "	15	37.70	+18.49
4 5	41.2			14. Very windy	16	37.51	
4 17	40.8				17	37.34	
4 11	40.2	41.4	29.559		18	37.50	
11 17	40.6	40.3	29.566		19	38.42	
1 34	40.6						
2 40	42.2	43.7	29.566				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	94 Ceti	E	3	3 5 5.5	2 57.6	50.65	49.45	.....	40 27 25.20	+ 0.72	-20.61	+ 50.48	- 1 33 2.13
		W	...	3 10 37.0	2 33.9	51.05	50.00	.....	319 31 52.05	+ 1.22	+15.48	- 50.50	
2	α Persei	W	2.5	3 14 52.0	2 49.4	50.90	49.75	.....	10 36 31.80	+ 0.97	-42.91	+ 11.11	+49 31 41.35
		E	...	3 20 22.5	2 41.1	50.65	49.10	.....	349 22 43.32	+ 0.52	+38.82	- 11.11	
3	τ^5 Eridani	E	3.5	3 26 53.0	2 49.7	50.80	49.40	.....	60 50 29.35	+ 0.74	-12.97	+1 46.01	-21 57 10.02
		W	...	3 32 31.0	2 48.3	51.10	49.95	.....	299 8 41.92	+ 1.18	+12.76	-1 46.05	
4	27 Tauri	W	2.5	3 40 49.0	2 50.1	50.45	49.20	.....	344 49 48.85	+ 0.49	+42.96	- 16.10	+23 45 55.91
		E	...	3 46 24.5	2 45.4	50.95	49.50	.....	15 9 21.28	+ 0.90	-40.62	+ 16.10	
5	γ Eridani	E	3	3 50 52.0	2 51.4	50.75	49.50	.....	52 40 37.28	+ 0.76	-15.22	+1 17.86	-13 46 47.80
		W	...	3 56 26.0	2 42.6	50.60	49.50	.....	307 18 35.30	+ 0.68	+13.70	-1 17.88	
6	ρ Tauri	W	2.5	4 2 22.0	2 49.3	50.00	48.85	.....	347 17 49.48	+ 0.10	+49.66	- 13.40	+26 14 5.98
		E	...	4 8 7.5	2 56.2	50.80	49.55	.....	12 41 26.70	+ 0.85	-53.78	+ 13.40	
7	ν^4 Eridani	E	4	4 11 46.0	2 39.1	50.80	49.55	.....	72 53 50.38	+ 0.87	- 9.31	+3 11.25	-34 1 58.98
		W	...	4 17 10.0	2 44.9	50.65	49.35	.....	287 5 22.58	+ 0.67	+10.00	-3 11.31	
8	α Ursæ Minoris S. P.	W	2.5	13 18 25.0	6 49.3	50.85	48.85	.....	52 14 27.65	+ 0.91	+ 1.87	+1 17.73	+88 48 33.60
		E	...	13 23 0.0	2 14.3	50.60	48.55	.....	307 44 45.90	+ 0.64	- 0.20	-1 17.71	
9	α Ursæ Minoris S. P.	E	2.5	13 26 40.0	1 25.7	50.55	48.55	.....	307 44 44.72	+ 0.62	- 0.08	-1 17.71	+88 48 33.28
		W	...	13 31 0.0	5 45.7	51.20	49.00	.....	52 14 27.50	+ 1.18	+ 1.33	+1 17.71	
10	83 Virginis	W	2.5	13 37 10.0	2 20.1	50.45	48.45	.....	305 23 18.92	+ 0.53	+ 9.83	-1 24.63	-15 42 16.88
		E	...	13 41 52.0	2 21.9	50.80	48.85	.....	54 35 56.25	+ 0.94	-10.09	+1 24.59	
11	92 Virginis	E	3	13 48 49.0	2 56.0	50.75	48.75	.....	37 23 53.78	+ 0.86	-21.63	+ 46.02	+ 1 30 35.86
		W	...	13 54 50.0	3 5.0	51.00	48.95	.....	322 35 18.52	+ 1.07	+23.90	- 46.02	
12	94 Virginis	W	3.5	13 59 33.0	1 50.6	50.35	48.50	.....	312 38 46.85	+ 0.49	+ 6.98	-1 5.25	- 8 26 32.04
		E	...	14 4 36.0	3 12.4	50.70	48.70	.....	47 20 41.50	+ 0.77	-21.12	+1 5.27	
13	ϵ Boötis	E	2.5	14 11 33.0	1 21.4	51.15	49.05	.....	347 7 9.10	+ 1.19	+ 7.81	- 13.76	+51 47 49.82
		W	...	14 15 25.5	2 31.1	51.70	49.70	.....	12 52 22.02	+ 1.78	-26.88	+ 13.77	
14	g Boötis	W	2.5	14 22 40.5	2 45.2	51.20	49.15	.....	11 20 26.28	+ 1.25	-37.64	+ 12.08	+50 15 42.58
		E	...	14 28 6.0	2 40.3	50.55	48.50	.....	348 38 46.12	+ 0.60	+35.44	- 12.08	
15	c^1 Centauri	E	3.5	14 35 10.0	2 48.7	51.20	49.10	.....	73 37 37.00	+ 1.27	-10.34	+3 22.47	-34 45 56.04
		W	...	14 40 34.0	2 35.3	51.65	49.70	.....	286 21 36.92	+ 1.80	+ 8.76	-3 22.45	
16	ξ Boötis	W	3	14 44 36.5	2 30.9	51.40	49.10	.....	340 33 36.92	+ 1.37	+27.38	- 21.24	+19 29 23.01
		E	...	14 49 49.0	2 41.6	51.25	49.10	.....	19 25 40.55	+ 1.29	-31.39	+ 21.24	
17	January 30, L. α Ursæ Minoris	E	2	1 18 5.0	7 8.8	50.95	50.30	.....	310 7 25.92	+ 0.53	+ 2.12	-1 8.25	+88 48 32.09
		W	...	1 22 50.0	2 23.8	51.05	50.35	.....	49 51 42.58	+ 0.63	- 0.24	+1 8.26	
18	α Ursæ Minoris	W	2	1 26 40.0	1 26.2	50.55	40.60	.....	49 51 43.62	- 0.01	- 0.09	+1 8.28	+88 48 32.55
		E	...	1 31 10.0	5 56.2	50.80	50.35	.....	310 7 26.28	+ 0.49	+ 1.46	-1 8.28	
19	February 9, L. γ Ceti	E	3	2 37 20.0	1 9.9	50.80	50.20	.....	72 26 42.25	+ 1.41	- 3.52	+ 42.86	+ 2 50 13.61
		W	...	2 41 13.0	2 43.1	51.90	51.25	.....	0 17 38.22	+ 2.52	+19.14	- 42.88	
20	ϵ Arietis (mean)	W	3	2 51 3.5	2 50.9	50.80	50.05	.....	18 24 33.28	+ 1.33	+37.53	- 19.09	+20 57 48.58
		E	...	2 56 8.0	2 13.6	50.50	49.65	.....	54 19 51.98	+ 0.98	-22.94	+ 19.09	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
29 3 8	40.6	...	...							1	359 59 37.02	+12.54
3 18	40.2	41.8	29.982							2	30.26	.....
3 30	39.6	...	...							3	30.47	.....
3 44	39.2	...	...							4	30.93	+ 4.45
3 54	38.6	...	...							5	36.24	.....
4 5	38.6	...	...							6	36.50	+ 4.11
4 15	38.2	39.8	29.972							7	37.56	.....
13 18	31.7	33.0	29.938							8	38.40	.....
13 30	31.7	...	...							9	37.64	.....
13 45	32.3	...	...							10	38.17	- 5.32
13 52	32.3	...	...							11	38.25	+ 0.33
14 7	32.4	...	...							12	37.74	.....
14 19	32.4	33.7	29.932							13	37.52	+12.89
14 31	32.3	...	...							14	36.02	+12.44
14 39	32.3	...	...							15	37.72	-13.36
14 48	32.4	33.7	29.936							16	38.06	+ 4.98
30 1 17	51.2	51.7	29.820							17	35.78	.....
1 32	50.9	51.6	29.820							18	35.88	.....
9 2 44	40.1	42.0	29.772							19	36 22 20.00	.....
2 54	40.1	...	...							20	21.08	.....

Note.
12. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	♈ Arietis	E W	3 ...	3 3 6.0 3 9 14.7	3 13.5 2 55.2	50.65 51.50	49.50 50.70	..... .....	55 55 47.60 16 48 57.60	+ 0.99 + 2.03	-44.77 +36.71	+ 20.93 - 20.94	+19 22 11.93
2	♉ Tauri	W E	3 ...	3 17 4.5 3 22 36.0	2 45.1 2 46.4	50.15 50.65	49.25 49.85	..... .....	6 8 59.75 66 35 40.18	+ 0.60 + 1.16	+22.71 -23.07	- 34.33 + 34.35	+ 8 41 44.67
3	♊ Eridani	E W	3 ...	3 26 43.0 3 32 16.0	2 59.4 2 33.6	50.95 50.75	50.15 49.75	..... .....	97 13 15.98 335 31 26.10	+ 1.47 + 1.16	-14.50 +10.63	+1 45.40 -1 45.43	-21 57 11.33
4	♋ Tauri	W E	3 ...	3 39 16.0 3 44 42.5	2 42.3 2 44.2	49.70 50.60	48.85 50.05	..... .....	21 15 30.35 51 29 11.60	+ 0.16 + 1.23	+39.22 -40.14	- 15.95 + 15.96	+23 48 49.17
5	♌ Eridani	E W	3.5 ...	3 53 30.0 3 58 46.0	2 29.5 2 46.5	51.05 51.25	50.45 50.40	..... .....	99 33 6.60 333 11 29.92	+ 1.67 + 1.75	- 9.68 +12.01	+1 56.46 -1 56.51	-24 17 17.33
6	♍ Eridani	W E	3 ...	4 4 20.0 4 9 54.0	2 52.2 2 32.8	50.20 50.65	49.35 50.25	..... .....	350 22 36.32 82 22 0.80	+ 0.67 + 1.35	+17.36 -13.67	-1 1.21 +1 1.21	- 7 5 11.67
7	♎ Tauri	E W	3 ...	4 17 19.5 4 22 34.5	2 48.2 2 26.8	51.40 51.30	50.55 50.35	..... .....	57 35 3.95 15 9 41.10	+ 1.90 + 1.75	-31.61 +24.08	+ 22.99 - 23.00	+17 42 39.96
8	♏ Eridani	W E	4 ...	4 29 2.0 4 34 32.0	2 56.6 2 33.4	50.20 51.20	49.20 50.30	..... .....	326 43 53.02 106 0 45.25	+ 0.61 + 1.07	+12.13 - 9.15	-2 38.47 +2 38.48	-30 45 37.87
9	♐ Tauri	E W	3 ...	4 43 4.0 4 48 17.0	2 53.3 2 19.7	51.25 51.05	50.70 50.20	..... .....	56 37 5.75 16 7 43.40	+ 1.90 + 1.55	-34.88 +22.67	+ 21.87 - 21.88	+18 40 42.16
10	♑ Tauri	W E	3 ...	4 54 33.0 4 59 37.0	3 0.5 2 3.5	50.00 51.05	49.35 50.30	..... .....	18 53 56.32 53 50 22.68	+ 0.57 + 1.59	+42.86 -20.07	- 18.68 + 18.68	+21 27 15.71
11	♒ Leporis	E W	3.5 ...	5 5 50.0 5 11 20.0	2 57.5 2 32.5	51.60 51.25	50.90 50.70	..... .....	91 35 41.88 341 9 0.40	+ 2.19 + 1.90	-15.62 +11.53	+1 25.37 -1 25.43	-16 19 16.10
12	♓ Camelop.	W E	3 ...	5 18 16.0 5 23 51.0	3 7.2 2 27.8	50.50 51.00	49.85 50.60	..... .....	60 26 18.75 12 18 25.65	+ 1.07 + 1.71	-16.56 +10.32	+ 26.58 - 26.60	+62 59 25.99
13	♈ Tauri	E W	3 ...	5 29 6.0 5 34 36.5	3 0.7 2 29.8	51.85 51.20	50.95 50.50	..... .....	54 12 57.70 18 31 53.80	+ 2.34 + 1.78	-42.19 +29.01	+ 19.18 - 19.19	+21 5 0.79
14	♉ Leporis	W E	3 ...	5 40 3.0 5 45 17.0	2 43.9 2 30.1	50.40 51.15	49.60 50.40	..... .....	342 36 31.70 90 8 7.38	+ 0.90 + 1.69	+13.66 -11.46	-1 21.19 +1 21.21	-14 51 40.27
15	♊ Orionis	E W	3 ...	5 59 19.5 6 4 39.0	2 58.0 2 21.5	52.25 52.25	51.45 51.30	..... .....	60 31 2.00 12 13 46.50	+ 2.81 + 2.73	-31.79 +20.09	+ 26.77 - 26.77	+14 46 37.99
16	February 13. L. ♈ Arietis (mean)	E W	3 ...	2 51 4.5 2 56 34.5	2 49.7 2 40.3	50.80 50.95	49.95 50.45	..... .....	54 20 5.65 18 24 35.45	+ 1.15 + 1.50	-37.01 +33.02	+ 18.72 - 18.73	+20 57 47.96
17	♈ H. Cephei	W E	2.5 ...	3 5 22.0 3 10 58.0	3 4.9 2 31.1	50.20 50.05	49.50 49.60	..... .....	74 49 57.18 357 54 44.00	+ 0.62 + 0.61	- 5.09 + 3.40	+ 45.94 - 45.98	+77 23 34.91
18	♊ Urse Minoris S. P.	E W	3 ...	3 18 38.0 3 23 58.0	2 18.1 3 1.9	49.70 51.25	49.30 50.70	..... .....	327 30 1.82 105 14 35.40	+ 0.25 + 1.78	-2.65 + 4.60	-2 28.06 +2 29.05	+72 9 53.22
19	♋ Urse Minoris S. P.	W E	3 ...	3 31 20.0 3 36 54.0	2 54.0 2 40.0	50.55 49.55	50.15 49.00	..... .....	99 45 31.58 332 59 8.12	+ 1.13 + 0.04	+ 3.07 - 2.59	+1 55.36 -1 55.41	+77 39 32.91
20	♌ Urse Minoris S. P.	E W	3 ...	3 44 40.0 3 50 14.0	2 47.0 2 47.0	49.50 51.00	48.85 50.65	..... .....	333 24 23.25 99 20 15.60	- 0.06 + 1.03	- 2.74 + 2.74	-1 53.42 +1 53.46	+78 4 50.20

Time	Ther. 1882.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>s</i>	<i>°</i>	<i>mm</i>			<i>° ' "</i>	
1 1 7	40.0		29.810		1	16 22 20.08	
1 1 17	19.7				2	20.68	
1 1 35	19.6				3	20.40	
1 1 41	19.1	40.1			4	21.22	
1 1 57	18.6				5	21.11	+20.40
4 1 8	18.5				6	21.43	
4 2 25	17.9				7	20.68	+7.19
4 3 11	17.9	38.9	29.814		8	21.27	+21.80
4 4 25	17.9				9	20.19	
4 5 5	17.6				10	21.08	
5 1 9	17.0				11	21.11	+18.03
5 2 17	16.1				12	20.46	
5 3 11	16.0				13	21.22	
5 4 1	15.4				14	21.94	
6 2 2	15.1	36.7	29.825		15	21.17	
1 1 2 14	49.9	50.9	29.804		16	19.88	
1 1 8	48.6				17	20.14	
1 1 21	47.5				18	20.64	
1 1 35	43.2				19	20.65	+13.84
1 1 48	46.6	48.0	29.800		20	20.21	

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	87 B. Draconis s. p.	W E	3 3.5	4 3 24.0 4 8 34.0	2 43.2 2 26.8	50.40 49.50	50.10 49.00	..... .....	109 20 34.70 323 24 4.68	+ 1.04 + 0.00	+ 4.42 - 3.57	+3 7.79 -3 7.88	+68 3 16.04
2	68 Tauri	W E	2.5 ...	4 17 16.5 4 22 53.3	2 51.0 2 45.8	49.85 49.80	49.40 49.20	..... .....	15 9 34.32 57 35 4.60	+ 0.39 + 0.28	+32.67 -30.71	- 22.62 + 22.62	+17 42 40.58
3	ν^7 Eridani	E W	3.5 ...	4 29 5.0 4 34 32.0	2 53.4 2 33.6	50.10 50.75	49.60 50.45	..... .....	106 0 51.40 326 43 51.58	+ 0.63 + 1.37	-11.69 + 9.17	+2 35.75 -2 35.74	-30 45 38.26
4	ι Tauri	W E	3 ...	4 43 4.0 4 48 34.0	2 53.2 2 36.8	49.75 49.90	49.20 49.20	..... .....	16 7 31.68 56 37 1.48	+ 0.24 + 0.33	+34.84 -28.56	- 21.49 + 21.50	+18 40 41.86
5	ϵ Tauri	E W	2.5 ...	4 55 6.3 5 0 22.0	2 27.1 2 48.6	50.20 51.50	49.65 50.95	..... .....	53 50 31.45 18 53 58.48	+ 0.71 + 2.01	-28.47 +37.38	+ 18.35 - 18.36	+21 27 15.34
6	μ Leporis	W E	... ...	5 6 9.0 5 12 4.0	2 38.3 3 16.7	50.45 50.00	49.90 49.50	..... .....	341 8 57.90 91 35 49.28	+ 0.97 + 0.51	+12.42 -19.18	-1 23.77 +1 23.79	-16 19 16.84
7	17 Camelop.	E W	3 ...	5 18 23.0 5 24 10.0	3 0.0 2 47.0	50.55 51.60	50.00 51.05	..... .....	12 18 20.30 60 26 16.05	+ 1.08 + 2.15	+15.31 -13.18	- 26.06 + 26.06	+62 59 26.82
8	ζ Tauri	W E	3 ...	5 29 14.5 5 34 38.3	2 52.1 2 31.7	51.05 50.25	50.30 49.50	..... .....	18 31 45.60 54 12 48.28	+ 1.47 + 0.66	+38.27 -29.74	- 18.78 + 18.77	+21 5 0.90
9	February 14, L. δ Libræ	W E	3 ...	14 54 47.0 14 58 34.7	1 14.3 2 33.4	52.35 51.20	48.70 47.55	..... .....	349 19 22.10 83 25 27.20	+ 2.44 + 1.27	+ 3.17 -13.50	-1 6.01 +1 6.05	- 8 8 43.06
10	48 H. Cephei s. p.	E W	3.5 ...	15 5 26.0 15 10 35.0	3 0.6 2 8.4	50.65 53.10	47.30 49.55	..... .....	332 43 23.75 100 1 19.98	+ 0.85 + 3.26	- 3.37 + 1.70	-2 3.92 +2 3.99	+77 23 37.59
11	γ^2 Ursæ Minoris	W E	3 ...	15 18 30.0 15 23 40.0	2 26.1 2 43.9	51.95 50.90	48.30 47.20	..... .....	69 36 19.32 3 8 20.00	+ 2.02 + 0.92	- 5.06 + 6.37	+ 40.40 - 40.40	+72 9 51.50
12	θ Ursæ Minoris	E W	3.5 ...	15 32 46.0 15 37 43.0	1 28.1 3 28.9	50.95 52.05	47.20 48.45	..... .....	357 38 53.55 75 5 51.45	+ 0.95 + 2.16	+ 1.13 - 6.33	- 49.43 + 49.44	+77 39 31.86
13	ζ Ursæ Minoris	W E	3.5 ...	15 45 4.0 15 50 6.0	2 23.0 2 39.0	51.65 50.40	47.85 46.75	..... .....	75 31 4.68 357 13 36.32	+ 1.65 + 0.45	- 2.84 + 3.51	+ 50.23 - 50.25	+78 4 48.44
14	87 B. Draconis	E W	3.5 ...	16 3 12.0 16 8 27.0	2 55.2 2 19.8	51.20 52.85	47.25 48.90	..... .....	7 14 48.30 65 29 48.32	+ 1.11 + 2.81	+10.00 - 6.37	- 34.43 + 34.43	+68 3 13.70
15	η Ursæ Minoris	W E	3.5 ...	16 17 14.0 16 23 23.0	3 3.2 3 5.8	51.65 51.20	47.95 47.05	..... .....	73 24 29.85 359 20 12.60	+ 1.69 + 1.01	- 5.73 + 5.90	+ 46.64 - 46.66	+75 58 6.40
16	February 15, L. δ Arietis	W E	3 ...	3 3 45.0 3 9 4.0	2 34.2 2 44.8	51.00 52.40	48.00 49.10	..... .....	16 49 8.80 55 55 35.35	+ 0.67 + 1.96	+28.44 -32.48	- 21.70 + 21.72	+19 22 11.42
17	α Tauri	E W	3 ...	3 17 32.0 3 22 27.0	2 17.3 2 37.7	52.50 51.60	49.15 48.35	..... .....	66 35 31.50 6 9 2.80	+ 2.04 + 1.16	-15.71 +20.73	+ 35.63 - 35.64	+ 8 41 44.39
18	τ^5 Eridani	W E	... ...	3 27 12.0 3 32 33.0	2 30.1 2 50.9	51.15 52.35	48.00 49.00	..... .....	335 31 32.35 97 13 11.02	+ 0.76 + 1.88	+10.15 -13.16	-1 49.33 +1 49.34	-21 57 10.99
19	η Tauri	E W	2.5 ...	3 39 2.3 3 44 28.7	2 55.7 2 30.7	52.60 51.50	49.30 48.15	..... .....	51 29 15.12 21 15 35.18	+ 2.17 + 1.02	-45.96 +33.81	+ 16.55 - 16.55	+23 48 49.38
20	τ^9 Eridani	W E	3 ...	3 53 9.0 3 58 38.0	2 50.2 2 38.8	51.10 52.60	47.70 49.30	..... .....	333 11 36.02 99 33 2.55	+ 0.58 + 2.16	+12.55 -10.92	-2 0.69 +2 0.72	-24 17 16.43

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
13 4 7	45.9	...	...					1	36 22 20.59	.....
4 20	45.3	...	...					2	20.78	+ 7.49
4 32	45.6	...	...					3	21.24	+22.20
4 40	...	47.1	29.796					4	20.01	.....
4 46	45.3	...	...					5	20.78	.....
4 58	45.0	...	...					6	20.96	+18.38
5 9	44.9	...	...					7	20.86	.....
5 22	44.5	...	...					8	22.26	.....
5 32	44.9	46.4	29.784					9	21.36	- 1.93
14 14 57	21.7	24.1	29.919					10	23.12	.....
15 8	20.8	...	...					11	21.78	.....
15 21	20.7	...	...					12	21.46	+13.85
15 36	20.9	...	...					13	21.88	.....
15 44	...	21.6	29.930					14	22.08	.....
15 48	20.3	...	...					15	22.65	.....
16 6	20.1	...	...					16	21.38	.....
16 21	19.7	20.7	29.936					17	21.26	.....
15 3 6	26.7	27.0	30.024					18	21.50	.....
3 20	25.9	...	...					19	20.67	.....
3 30	26.3	...	...					20	21.48	+20.80
3 42	25.7	...	...					

Notes.
6. Very faint; clouds.
8 E. Clock time decreased 10^m.

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α^1 Eridani	E W	3 ...	4 5 9.0 4 9 12.0	2 11.9 1 51.1	53.00 52.00	49.95 48.95	...	82 21 53.90 350 22 48.12	+ 2.70 + 1.67	-10.18 + 7.23	+1 3.43 -1 3.46	- 7 5 11.55
2	γ Ursæ Minoris S. P.	W E	4 ...	4 17 26.0 4 23 0.0	2 51.2 2 42.8	51.35 52.05	48.25 48.70	...	101 26 41.72 331 17 58.08	+ 0.97 + 1.58	+ 3.33 - 3.01	+2 11.48 -2 11.52	+75 58 7.23
3	ν Eridani	E W	2.5 ...	4 28 51.0 4 34 18.7	2 50.8 2 36.9	52.40 51.75	49.20 48.40	...	78 49 51.42 353 54 51.22	+ 2.01 + 1.26	-18.30 +15.45	+ 56.16 - 56.17	- 3 32 53.17
4	π^4 Orionis	W E	3 ...	4 43 33.0 4 48 45.0	2 43.5 2 28.5	50.65 52.20	47.35 49.30	...	2 53 56.02 69 50 43.88	+ 0.18 + 1.95	+20.47 -16.89	- 40.63 + 40.64	+ 5 26 29.82
5	157 H ¹ . Cephei	E W	2.5 ...	4 55 12.0 5 0 12.0	3 21.3 1 38.7	52.55 51.80	48.95 48.15	...	349 28 11.70 83 16 25.52	+ 1.95 + 1.17	+ 1.71 - 0.41	-1 5.63 +1 5.03	+85 50 27.68
6	λ Aurigæ	W E	2.5 ...	5 12 ..... .....	..... .....	51.05 52.15	47.55 48.85	26.416 26.416	37 27 0.35 35 15 41.25	- 0.25 + 0.98	- 0.28 + 0.28	+ 1.17 - 1.17	+40 0 56.41
7	18 Camelop. February 16, L.	E W	3 ...	5 21 38.0 5 27 12.0	2 57.9 2 36.1	52.70 51.15	49.40 47.55	...	18 8 9.50 54 36 24.50	+ 2.25 + 0.52	+23.27 -17.92	- 20.28 + 20.28	+57 9 22.91
8	157 H ¹ . Cephei	W E	3.5 ...	4 55 25.0 5 0 32.0	3 8.0 1 59.0	51.00 51.25	48.15 48.70	...	83 16 27.78 349 28 13.25	+ 0.92 + 1.33	- 1.49 + 0.60	+1 5.40 -1 5.42	+85 50 28.01
9	λ Aurigæ	E W	2.5 ...	5 12 ..... .....	..... .....	51.40 51.40	48.95 48.70	26.373 26.373	35 15 42.02 37 27 0.12	+ 2.27 + 2.60	+ 0.28 - 0.70	- 1.17 + 1.17	+40 0 56.49
10	18 Camelop.	W E	3 ...	5 21 52.0 5 27 21.0	2 43.7 2 45.3	50.95 51.20	48.30 48.45	...	54 36 25.72 18 8 13.55	+ 0.98 + 1.18	-19.70 +20.09	+ 20.22 - 20.23	+57 9 22.91
11	ζ Leporis	E W	3.5 ...	5 40 3.0 5 45 29.0	2 43.5 2 42.5	51.40 51.10	48.60 48.40	...	90 8 7.10 342 36 33.02	+ 1.36 + 1.10	-13.59 +13.42	+1 23.62 -1 23.64	-14 51 40.71
12	θ Aurigæ	W E	2.5 ...	5 53 ..... .....	..... .....	51.00 51.20	48.35 48.50	25.598 25.598	34 39 1.52 38 4 48.45	+ 0.30 + 0.49	- 0.25 + 0.25	- 1.84 + 1.84	+37 12 20.94
13	74 G. Columbæ	E W	3.5 ...	5 59 43.0 6 5 12.0	2 50.3 2 38.7	51.30 51.10	48.60 48.45	...	105 0 25.12 327 44 18.90	+ 1.31 + 1.12	-11.47 + 9.96	+2 35.96 -2 35.99	-29 45 11.87
14	7 Monocerotis	W E	3 ...	6 14 11.0 6 18 1.0	1 5.1 2 44.9	50.35 50.95	47.70 48.50	...	349 40 53.72 83 4 2.05	+ 0.37 + 1.08	+ 2.45 -15.71	-1 5.15 +1 5.15	- 7 47 14.00
15	13 Monocerotis	E W	3 ...	6 25 10.0 6 32 24.5	2 44.2 4 30.3	51.30 50.75	48.65 48.40	...	67 53 24.22 4 50 39.68	+ 1.34 + 0.93	-21.71 +58.79	+ 37.69 - 37.70	+ 7 23 56.67
16	ϕ^5 Aurigæ	W E	3 2.5	6 40 ..... .....	..... .....	50.70 51.05	48.20 48.40	25.147 25.147	41 7 7.38 31 37 18.40	+ 0.08 + 0.36	- 0.32 + 0.32	+ 5.11 - 5.11	+43 40 15.73
17	ϵ Canis Majoris	E W	3.5 ...	6 49 12.0 6 54 49.0	2 49.8 2 47.2	51.50 51.15	48.75 48.45	...	92 12 32.30 340 32 10.30	+ 1.48 + 1.15	-14.14 +13.71	+1 30.41 -1 30.41	-16 56 11.06
18	45 Geminorum	W E	3.5 ...	7 0 17.5 7 5 32.5	2 46.2 2 28.8	50.30 50.85	47.55 48.35	...	13 31 45.78 59 12 52.08	+ 0.27 + 0.95	+29.01 -23.25	- 25.91 + 25.91	+16 4 43.32
19	29 Canis Majoris February 17, L.	E W	3.5 ...	7 12 0.0 7 17 30.0	2 50.8 2 29.2	51.45 51.20	48.60 48.50	...	99 39 16.28 333 5 25.82	+ 1.40 + 1.22	-12.62 + 9.63	+2 1.71 -2 1.72	-24 23 29.32
20	γ^2 Ursæ Minoris S. P.	W E	3 ...	3 18 14.0 3 23 48.0	2 42.2 2 51.8	49.95 50.10	50.00 50.10	...	105 14 32.00 327 30 8.42	+ 0.46 + 0.57	+ 3.66 - 4.11	+2 34.23 -2 34.32	+72 9 53.51

Time	Ther. 1882	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below			No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>					<i>° ' "</i>	<i>"</i>
17 3 36	25.7	26.1	30.041	6, 12, 16. Instrument in meridian, observation at IX with movable thread			1	36 22 21.70	...
4 8	25.1	...	...	9 Instrument in meridian; E. observation at I, W. observation at I + 14° with movable thread.			2	21 32	...
4 21	24.7	...	...				3	21 52	...
4 32	24.7	...	...				4	21 51	+12.06
4 46	24.1	25.4	30.058				5	20 52	-10.48
4 58	24.3	...	...				6	22 16	...
5 59	24.2	...	...				7	21.06	-1.69
6 28	23.9	25.1	30.066				8	21.18	-10.56
16 4 08	28.4	30.0	30.126				9	21.62	...
5 11	28.0	...	...				10	20.90	3.76
5 26	27.7	...	...				11	21.20	...
5 43	27.4	29.4	30.124				12	21.07	...
5 52	27.4	...	...				13	21 36	+20.70
6 1	27.1	...	...				14	21.98	...
6 21	26.7	...	...				15	21.62	+11.69
6 25	26.7	...	...				16	21 18	...
6 42	26.8	28.7	30.121				17	21 40	+16.82
6 52	26.7	...	...				18	21 42	+ 9.42
7 1	26.7	...	...				19	20.86	+17.14
7 12	26.6	28.6	30.121				20	20.46	...
17 1 21	16.8	18.0	30.160						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	θ Ursæ Minoris S. P.	E W	3 ...	3 31 32.0 3 36 58.0	2 42.2 2 43.8	50.00 50.10	50.25 50.30	..... .....	332 59 11.75 99 45 28.10	+ 0.60 + 0.68	- 2.67 + 2.72	-1 59.47 +1 59.53	+77 39 33.00
2	ζ Ursæ Minoris S. P.	W E	3.5 ...	3 44 38.0 3 50 26.0	2 49.2 2 58.8	49.60 50.15	49.65 50.00	..... .....	99 20 13.90 333 24 27.62	+ 0.10 + 0.57	+ 2.82 - 3.14	+1 57.48 -1 57.55	+78 4 50.01
3	87 B. Draconis S. P.	E W	4 ...	4 3 20.0 4 8 45.0	2 47.2 2 37.8	49.85 50.00	50.00 50.10	..... .....	323 24 12.02 109 20 27.88	+ 0.41 + 0.54	- 4.64 + 4.13	-3 14.61 +3 14.68	+68 3 16.39
4	η Ursæ Minoris S. P.	E W	3.5 ...	4 17 8.0 4 22 0.0	3 9.3 1 42.7	50.05 49.90	50.20 49.90	..... .....	331 17 57.62 101 26 44.38	+ 0.60 + 0.38	- 4.06 + 1.20	-2 9.22 +2 9.24	+75 58 8.28
5	A Draconis S. P.	W E	4 ...	4 26 14.0 4 30 2.0	1 58.9 1 49.1	49.60 50.00	49.45 50.00	..... .....	108 25 51.38 324 18 48.48	- 0.01 + 0.48	+ 2.26 - 1.90	+3 4.56 -3 4.60	+68 58 5.55
6	ν Persei	W E	3 ...	3 39 ..... .....	..... .....	48.50 49.25	49.30 50.30	26.127 26.127	39 43 10.98 32 59 54.82	+ 1.30 + 2.20	- 0.30 + 0.30	+ 3.41 - 3.41	+42 16 57.33
7	ζ Persei	E W	2.5 ...	3 48 ..... .....	..... .....	49.35 48.75	50.45 49.70	25.177 25.177	43 41 2.18 29 3 15.72	+ 3.79 + 3.09	+ 0.21 - 0.21	+ 7.46 - 7.46	+31 36 15.34
8	c Persei	W E	2.5 ...	4 2 ..... .....	..... .....	47.90 48.95	48.65 49.95	27.357 27.357	44 53 4.52 27 48 20.55	+ 0.67 + 1.88	- 0.37 + 0.37	+ 8.74 - 8.74	+47 27 46.34
9	54 Persei	E W	2.5 ...	4 14 ..... .....	..... .....	49.40 48.45	50.25 48.95	27.176 27.176	40 55 36.15 31 46 0.12	+ 3.70 + 2.56	+ 0.22 - 0.22	+ 4.67 - 4.67	+34 20 23.11
10	m Persei	W E	2 ...	4 27 ..... .....	..... .....	47.65 48.80	48.35 50.05	28.177 28.177	40 16 40.15 32 23 40.28	+ 0.39 + 1.83	- 0.31 + 0.31	+ 4.02 - 4.02	+42 51 49.51
11	ζ Aurigæ	E W	2.5 ...	4 56 ..... .....	..... .....	50.05 49.05	50.85 49.55	25.916 25.916	34 20 36.85 38 22 41.78	+ 4.35 + 3.18	+ 0.29 - 0.29	- 2.06 + 2.06	+40 56 20.24
12	μ Aurigæ	W E	3 ...	5 7 ..... .....	..... .....	47.95 49.10	48.20 49.90	26.257 26.257	35 48 36.10 36 54 18.98	+ 0.47 + 1.94	- 0.26 + 0.26	- 0.56 + 0.56	+38 22 23.59
13	χ Aurigæ	E W	2.5 ...	5 27 ..... .....	..... .....	49.55 48.35	50.35 49.10	25.897 25.897	43 9 29.72 29 33 50.78	+ 3.84 + 2.57	+ 0.21 - 0.21	+ 6.99 - 6.99	+32 7 19.29
14	ν Aurigæ	W E	2.5 ...	5 45 ..... .....	..... .....	47.65 48.60	48.45 49.55	26.132 26.132	36 33 33.50 36 9 33.82	+ 0.43 + 1.48	- 0.27 + 0.27	+ 0.21 - 0.20	+39 7 15.84
15	θ Aurigæ	E W	2.5 ...	5 53 ..... .....	..... .....	48.75 48.00	49.65 48.60	25.624 25.624	38 4 43.75 34 38 58.62	+ 3.07 + 2.15	+ 0.25 - 0.25	+ 1.76 - 1.76	+37 12 21.55
16	51 Aurigæ	W E	2 ...	6 32 ..... .....	..... .....	46.65 48.15	47.50 49.00	26.250 26.250	36 54 37.72 35 48 20.35	- 0.56 + 0.98	- 0.28 + 0.28	+ 0.57 - 0.57	+39 28 24.79
17	ψ ⁷ Aurigæ	E W	2.5 ...	6 44 ..... .....	..... .....	48.35 47.90	49.30 48.70	25.763 25.763	33 23 36.50 39 19 57.15	+ 2.68 + 2.14	+ 0.30 - 0.30	- 3.06 + 3.06	+41 53 29.41
18	h Geminorum	W E	2.5 ...	6 58 ..... .....	..... .....	47.05 48.45	47.60 49.30	25.214 25.214	26 56 41.52 45 47 38.82	- 0.30 + 1.27	- 0.19 + 0.19	- 9.80 + 9.80	+29 29 37.17
19	64 Aurigæ	E W	2 ...	7 12 ..... .....	..... .....	48.65 47.75	49.40 48.30	26.721 26.721	34 13 27.12 38 28 47.60	+ 2.89 + 1.87	+ 0.29 - 0.29	- 2.20 + 2.20	+41 2 58.23
20	ρ Geminorum	W E	3 ...	7 23 ..... .....	..... .....	47.40 48.35	47.90 49.05	24.747 24.747	29 25 34.55 43 19 25.80	+ 0.02 + 1.11	- 0.21 + 0.21	- 7.21 + 7.21	+31 58 13.00

Time.	Ther. 38°2.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
17 3 34	36.2	.....	.....	6, 8, 10, 12, 14, 16, 18, 20. Instrument in meridian, observation at IX with movable thread.						1	36 22 20.62	+13.89
3 48	35.5	.....	.....	7, 9, 11, 13, 15, 17, 19. Instrument in meridian, observation at I with movable thread.						2	20.90	.....
4 6	34.8	.....	.....							3	20.20	.....
4 16	34.5	.....	.....							4	20.07	.....
4 33	34.2	35.8	30.152							5	20.32	.....
19 3 37	49.8	51.0	29.936							6	23.94	.....
3 46	49.3	.....	.....							7	22.89	.....
3 59	48.3	.....	.....							8	23.33	.....
4 12	47.7	.....	.....							9	23.40	+ 1.76
4 54	46.2	48.2	29.950							10	24.34	.....
5 24	44.9	.....	.....							11	23.75	.....
5 59	43.5	46.0	29.970							12	23.34	.....
6 30	42.3	.....	.....							13	23.34	.....
6 56	42.4	.....	.....							14	24.11	.....
7 21	41.5	43.7	29.994							15	22.54	.....
										16	23.56	.....
										17	23.66	+ 2.40
										18	22.66	+ 5.99
										19	23.28	+ 3.36
										20	23.68	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
	February 20, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	10 Tauri	E W	2.5 ...	3 29 17.5 3 34 30.5	2 50.9 2 22.1	49.10 48.90	50.60 50.35	..... .....	75 11 9.65 357 33 35.70	+ 1.66 + 1.43	-19.77 +13.67	+ 45.96 - 45.96	+ 0 6 0.25
2	27 Tauri	W E	2.5 ...	3 40 44.2 3 46 10.7	2 54.1 2 32.4	47.85 48.45	49.30 50.10	..... .....	21 12 29.90 51 32 2.68	+ 0.37 + 1.10	+45.00 -34.49	- 15.50 + 15.50	+23 45 54.07
3	λ Tauri	E W	2.5 ...	3 52 42.5 3 58 7.0	2 49.8 2 34.7	49.05 49.05	50.35 50.35	..... .....	63 4 13.38 9 40 30.95	+ 1.54 + 1.53	-26.61 +22.09	+ 28.77 - 28.77	+12 13 20.94
4	μ Persei	W E	2 ...	4 8 ..... .....	..... .....	47.90 48.35	49.55 50.00	27.335 27.335	45 35 37.70 27 5 50.32	- 0.23 + 0.22	- 0.37 + 0.37	+ 9.32 - 9.32	+48 10 19.00
5	m Persei	E W	2 ...	4 27 ..... .....	..... .....	49.70 50.45	51.15 51.45	28.078 28.078	32 23 40.75 40 16 38.95	+ 2.97 + 3.54	+ 0.31 - 0.31	- 3.95 + 3.95	+42 51 49.60
6	π ⁴ Orionis	E W	2.5 ...	4 43 18.5 4 48 46.5	2 57.7 2 30.3	49.40 49.40	50.70 50.75	..... .....	69 50 53.02 2 53 53.45	+ 1.87 + 1.88	-24.18 +17.30	+ 37.91 - 37.92	+ 5 26 29.62
7	ιι Orionis	W E	2.5 ...	4 56 29.5 5 1 39.5	2 46.7 2 23.3	48.45 48.65	49.95 50.20	..... .....	12 43 18.00 60 1 17.58	+ 1.00 + 1.22	+28.35 -20.95	- 25.14 + 25.15	+15 16 16.18
8	β Orionis	E W	2.5 ...	5 7 27.0 5 12 33.0	2 38.6 2 27.4	49.10 49.55	50.65 50.65	..... .....	83 35 40.72 349 9 0.70	+ 1.68 + 1.93	-14.39 +12.43	+1 2.04 -1 2.07	- 8 18 51.95
9	η Orionis (mean)	W E	2.5 ...	5 16 51.0 5 22 17.0	2 58.5 2 27.5	48.50 49.00	50.30 50.40	..... .....	354 58 20.55 77 46 13.62	+ 1.21 + 1.53	+20.42 -13.94	- 50.69 + 50.72	- 2 29 13.64
10	ζ Orionis	E W	3 ...	5 28 5.0 5 33 25.0	2 49.6 2 30.4	49.50 49.85	50.70 51.10	..... .....	81 15 26.90 351 29 13.78	+ 1.91 + 2.30	-17.20 +13.52	+ 57.32 - 57.35	- 5 58 31.76
11	γ Leporis	W E	3 3.5	5 38 1.0 5 43 19.0	2 36.3 2 41.7	48.95 48.95	50.45 50.50	..... .....	334 59 34.42 97 45 5.52	+ 1.51 + 1.54	+10.91 +11.68	-1 45.22 +1 45.23	-22 29 2.92
12	η Leporis	E W	3 ...	5 49 13.0 5 54 30.5	2 59.1 2 18.4	49.20 49.75	50.55 51.10	..... .....	89 27 56.85 343 16 47.65	+ 1.68 + 2.25	-16.50 + 9.85	+1 16.63 -1 16.65	-14 11 21.20
13	ν Orionis	W E	3 ...	5 59 19.0 6 4 46.5	2 58.0 2 29.5	49.05 48.85	50.30 50.30	..... .....	12 13 37.38 60 30 54.90	+ 1.47 + 1.38	+31.79 -22.42	- 25.85 + 25.86	+14 46 39.12
14	7 Monocerotis	E W	3.5 ...	6 12 26.0 6 17 49.0	2 49.9 2 33.1	49.45 50.30	50.90 51.50	..... .....	83 4 6.40 349 40 35.18	+ 2.02 + 2.76	-16.67 +13.54	+1 1.18 -1 1.18	- 7 47 14.74
15	10 Tauri	W E	3 ...	3 29 4.0 3 34 40.0	3 4.2 2 37.8	48.80 48.95	49.50 49.60	..... .....	357 33 28.20 75 11 7.55	+ 0.73 + 0.87	+22.97 -26.85	- 46.51 + 46.55	+ 0 6 0.22
16	27 Tauri	E W	2.5 ...	3 40 56.7 3 46 24.3	2 41.3 2 46.3	49.40 49.45	50.40 50.25	..... .....	51 32 5.45 21 12 32.20	+ 1.51 + 1.45	-38.63 +41.06	+ 15.71 - 15.72	+23 45 54.06
17	λ Tauri	W E	2.5 ...	3 52 38.5 3 58 4.3	2 53.6 2 32.2	48.75 49.10	49.75 49.95	..... .....	9 40 27.32 63 4 7.68	+ 0.83 + 1.12	+27.82 -21.38	- 29.18 + 29.20	+12 13 21.66
18	μ Persei	E W	2 ...	4 8 ..... .....	..... .....	49.50 49.55	50.30 50.40	27.270 27.270	27 5 51.05 45 35 36.12	+ 2.22 + 2.30	+ 0.37 - 0.37	- 9.47 + 9.47	+48 10 18.26
19	♂ Eridani	W E	4 ...	4 17 50.0 4 23 12.0	2 44.2 2 37.8	48.35 49.20	48.95 49.90	..... .....	323 15 37.82 109 29 3.42	+ 0.21 + 1.15	+ 9.88 - 9.13	-3 9.44 +3 9.51	-34 14 26.66
20	53 Eridani	E W	3 ...	4 31 7.0 4 36 28.0	2 49.4 2 31.6	49.65 49.45	50.65 50.45	..... .....	89 46 4.38 342 58 38.45	+ 1.76 + 1.55	-14.60 +11.76	+1 18.20 -1 18.31	-14 29 31.56

Time.	Ther. 3862.	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>s</i>	<i>°</i>	<i>m.</i>						<i>° ' "</i>	<i>"</i>
20 3 32	57.1	68.0	29.959	Instrument in meridian, observation at IX with movable thread.				1	36 23 21.17	.....
3 41	57.2	.....	.....	Instrument in meridian, observation at I with movable thread.				2	22 28	+ 5.14
4 15	56.9	.....	.....					3	21.44	.....
4 35	57.1	.....	.....					4	22 62	- 2.93
4 45	56.3	.....	.....					5	22 06	.....
4 52	56.5	66.3	29.960					6	21 06	+12.10
4 59	56.2	.....	.....					7	22 60	.....
5 10	54.6	.....	.....					8	21 52	.....
5 22	53.2	.....	.....					9	21 71	+14.87
5 31	51.2	64.6	29.966					10	20 59	.....
5 53	52.9	.....	.....					11	21 12	+20.14
6 2	52.6	.....	.....					12	20 38	+17.95
6 11	52.1	51.2	29.978					13	22 26	.....
3 32	55.6	61.4	29.958					14	21 62	.....
3 41	47.6	.....	.....					15	21 76	.....
3 55	47.2	.....	.....					16	21 52	+ 5.16
4 6	48.1	.....	.....					17	21 70	.....
4 21	47.6	.....	.....					18	21 86	- 2.95
4 34	47.2	49.8	29.911					19	21 71	.....
								20	21 60	.....

Note
1-14. Hazy.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α^1 Orionis	W	3	4 44 27.5	2 49.4	48.35	49.25	.....	11 32 34.42	+ 0.37	+28.13	- 26.98	+14 5 30.40
		E	...	4 49 46.0	2 29.1	49.10	50.25	.....	61 12 1.82	+ 1.27	-21.79	+ 26.99	
2	π Orionis	E	2.5	4 56 17.0	2 59.0	49.25	50.25	.....	60 1 28.55	+ 1.33	-32.68	+ 25.57	+15 16 16.20
		W	...	5 1 44.0	2 28.0	49.70	50.45	.....	12 43 23.55	+ 1.67	+22.35	- 25.57	
3	σ Columbæ	W	4	5 11 36.0	2 33.8	48.80	49.75	.....	322 30 40.65	+ 0.86	+ 8.56	-3 19.30	-34 59 34.58
		E	...	5 16 54.0	2 44.2	49.40	50.30	.....	110 14 2.05	+ 1.46	- 9.76	+3 19.35	
4	ρ Camelop.	E	2.5	5 25 25.0	2 48.8	50.10	50.70	.....	11 12 6.78	+ 2.03	+12.42	- 27.47	+64 5 44.84
		W	...	5 30 44.0	2 30.2	50.10	50.75	.....	61 32 30.60	+ 2.04	- 9.83	+ 27.48	
5	γ^2 Ursæ Minoris	E	3	15 18 6.0	2 50.3	49.50	49.10	.....	3 8 19.25	+ 0.97	+ 6.88	- 39.40	+72 9 51.40
		W	...	15 23 50.0	2 53.7	50.65	50.50	.....	69 36 22.82	+ 2.27	- 7.15	+ 39.41	
6	θ Ursæ Minoris	W	3	15 31 41.0	2 33.5	50.45	50.30	.....	75 5 49.62	+ 2.05	- 3.42	+ 48.23	+77 39 31.43
		E	...	15 37 20.0	3 5.5	49.10	48.90	.....	357 38 49.38	+ 0.65	+ 4.99	- 48.24	
7	ϵ Ursæ Minoris	E	3	15 44 56.0	2 31.5	48.95	48.80	.....	357 13 37.15	+ 0.51	+ 3.19	- 48.99	+78 4 47.10
		W	...	15 50 24.0	2 56.5	50.40	50.20	.....	75 31 6.22	+ 1.98	- 4.32	+ 49.01	
8	δ B. Draconis	W	3	16 3 8.0	2 59.3	49.70	49.30	.....	65 29 54.35	+ 1.16	-10.47	+ 33.59	+68 3 13.23
		E	...	16 8 52.0	2 44.7	49.05	48.85	.....	7 14 49.48	+ 0.61	+ 8.84	- 33.60	
9	η Ursæ Minoris	E	3	16 16 50.0	3 27.4	48.95	48.65	.....	359 20 11.85	+ 0.46	+ 7.34	- 45.46	+75 58 5.17
		W	...	16 22 6.0	1 48.6	50.40	50.05	.....	73 24 26.00	+ 1.92	- 2.01	+ 45.46	
10	α Draconis	W	3	16 26 3.0	2 10.0	49.95	49.70	.....	66 24 37.25	+ 1.50	- 5.14	+ 34.84	+68 58 2.76
		E	...	16 30 26.0	2 13.0	48.95	48.75	.....	6 20 5.08	+ 0.48	+ 5.38	- 34.84	
11	θ Camelop. S. P.	E	3.5	16 42 10.0	2 36.5	49.00	49.00	.....	321 32 31.95	+ 0.65	- 4.35	-3 39.07	+66 11 10.42
		W	...	16 47 10.0	2 23.5	50.80	50.35	.....	111 12 10.18	+ 2.28	+ 3.05	+3 39.07	
12	ϵ Ursæ Minoris	W	2.5	16 52 54.0	2 41.9	50.45	50.05	.....	79 37 29.78	+ 1.93	- 2.20	+ 56.65	+82 11 21.17
		E	...	16 58 44.0	3 8.1	49.30	48.95	.....	353 7 9.85	+ 0.79	+ 2.98	- 56.64	
13	ζ Draconis	E	3	17 6 0.0	2 33.7	49.85	49.35	.....	9 28 22.60	+ 1.28	+ 9.07	- 30.56	+65 49 35.58
		W	...	17 11 11.0	2 37.3	51.05	50.75	.....	63 16 16.72	+ 2.61	- 9.50	+ 30.56	
14	February 23, L. ν Persei	E	2.5	3 39 .....	.....	48.80	49.50	25.128	33 0 33.82	+ 1.50	+ 0.30	- 3.40	+42 16 56.86
		W	...	.....	.....	49.55	50.50	25.128	39 43 47.25	+ 2.43	- 0.30	+ 3.40	
15	ζ Persei	W	2.5	3 48 .....	.....	49.15	50.20	26.281	29 2 31.82	+ 0.57	- 0.21	- 7.46	+31 36 15.54
		E	...	.....	.....	48.55	49.55	26.281	43 40 19.20	- 0.08	+ 0.21	+ 7.46	
16	ϵ Persei	E	3	4 2 .....	.....	48.65	49.30	25.550	27 49 31.82	+ 1.35	+ 0.37	- 8.74	+47 27 46.42
		W	...	.....	.....	49.30	50.30	25.550	44 54 13.95	+ 2.15	- 0.37	+ 8.74	
17	ρ Ursæ Minoris S. P.	W	4	4 10 58.0	2 32.9	48.95	50.00	.....	101 18 15.45	+ 1.09	+ 2.63	+2 3.93	+76 6 40.13
		E	...	4 16 10.0	2 39.1	48.40	49.20	.....	331 26 22.98	+ 0.40	- 2.84	-2 4.02	
18	α Draconis S. P.	E	4	4 25 20.0	2 51.0	48.25	49.35	.....	324 18 44.78	+ 0.41	- 4.68	-2 58.35	+68 58 5.07
		W	...	4 31 10.0	2 59.0	49.70	50.65	.....	108 25 53.42	+ 1.86	+ 5.13	+2 58.45	
19	θ Camelop.	W	3	4 41 53.0	2 51.5	49.40	50.10	.....	63 37 51.08	+ 1.42	-11.00	+ 30.11	+66 11 8.71
		E	...	4 47 17.0	2 32.5	48.75	49.35	.....	9 6 48.10	+ 0.67	+ 8.70	- 30.12	
20	ϵ Ursæ Minoris S. P.	E	4	4 53 0.0	2 34.0	48.35	49.15	.....	337 30 37.50	+ 0.35	- 1.60	-1 36.57	+82 11 22.58
		W	...	4 58 15.0	2 41.0	50.00	50.90	.....	95 14 0.90	+ 2.07	+ 1.75	+1 36.63	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
22 4 47	46.9	.....	.....	14, 16. Instrument in meridian, observation at I with movable thread.	1	36 22 22.12	+ 9.22
4 59	46.2	.....	.....	15. Instrument in meridian, observation at IX with movable thread.	2	22.38	.....
5 15	45.9	.....	.....		3	21.94	.....
5 29	45.7	47.4	29.916		4	22.02	- 6.10
15 22	33.8	35.7	30.022		5	22.52	.....
15 35	33.7	.....	.....		6	21.63	+14.03
15 48	33.3	.....	.....		7	22.38	.....
16 7	32.7	.....	.....		8	21.98	.....
16 15	33.1	35.0	30.030		9	22.78	.....
16 31	33.1	.....	.....		10	22.28	.....
16 45	33.3	.....	.....		11	22.18	.....
16 56	33.3	.....	.....		12	21.57	.....
17 9	33.3	34.7	30.038		13	21.39	.....
23 3 36	52.0	53.4	30.006	Notes. 11 W. One microscope reading decreased 10". 17, 18. Paint; hazy.	14	21.00	.....
3 46	50.7	.....	.....		15	21.34	.....
4 0	49.6	.....	.....		16	20.36	.....
4 14	48.6	.....	.....		17	19.81	.....
4 28	47.9	50.1	30.004		18	20.51	.....
4 45	47.1	.....	.....		19	19.48	.....
4 56	46.6	.....	.....		20	20.51	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ζ Draconis S. P.	W	4	5 5 38.0	2 53.8	49.50	50.25	.....	111 33 41.08	+ 1.54	+ 5.43	+3 38.26	+65 49 37.82
		E	...	5 11 12.0	2 40.2	48.50	49.15	.....	321 10 57.70	+ 0.44	- 4.61	-3 38.42	
2	η Orionis (mean)	E	3	5 17 21.0	2 26.2	48.90	49.60	.....	77 46 10.68	+ 0.86	-13.70	+ 51.71	- 2 29 12.76
		W	...	5 22 17.0	2 29.8	50.35	51.20	.....	354 58 25.78	+ 2.42	+14.38	- 51.72	
3	ε Orionis	W	3	5 28 6.0	2 46.4	49.75	50.50	.....	351 29 11.62	+ 1.78	+16.55	- 58.44	- 5 58 31.58
		E	...	5 33 24.0	2 31.6	48.75	49.05	.....	81 15 22.28	+ 0.84	-13.74	+ 58.45	
4	19 Ursæ Minoris	W	2.5	16 11 15.0	2 15.8	49.85	49.40	.....	73 32 57.65	+ 1.41	- 3.11	+ 45.69	+76 6 37.22
		E	...	16 16 6.0	2 35.2	49.95	49.60	.....	359 11 40.40	+ 1.00	+ 4.06	- 45.70	
5	A Draconis	E	3	16 25 21.0	2 50.0	50.25	49.95	.....	6 19 58.80	+ 1.93	+ 8.79	- 34.88	+68 58 3.18
		W	...	16 30 39.0	2 28.0	50.35	49.85	.....	66 24 37.70	+ 1.89	- 6.66	+ 34.90	
6	114 B. Draconis	W	3	16 42 12.0	1 20.1	48.95	48.70	.....	54 23 34.40	+ 0.62	- 4.80	+ 19.65	+56 56 45.06
		E	...	16 46 24.0	2 51.9	49.35	48.90	.....	18 20 49.58	+ 0.90	+22.10	- 19.66	
7	ε Ursæ Minoris	E	3.5	16 53 24.0	2 10.0	50.05	49.70	.....	353 7 9.70	+ 1.68	+ 1.42	- 56.77	+82 11 20.82
		W	...	16 58 20.0	2 46.0	50.45	49.85	.....	79 37 28.10	+ 1.97	- 2.32	+ 56.77	
8	ζ Draconis	W	2.5	17 5 47.0	2 44.7	49.50	49.00	.....	63 16 18.20	+ 1.03	-10.42	+ 30.63	+65 49 35.28
	February 24, L.	E	...	17 11 18.0	2 46.3	49.75	49.05	.....	9 28 20.85	+ 1.19	+10.62	- 30.63	
9	δ Persei	W	3	3 36 .....	.....	48.35	49.50	27.417	44 54 32.75	+ 0.64	- 0.37	+ 8.55	+47 29 18.49
		E	...	.....	.....	48.20	49.55	27.417	27 46 45.32	+ 0.61	+ 0.37	- 8.55	
10	ε Persei	E	2.5	3 52 .....	.....	49.70	51.10	25.882	35 32 36.35	+ 3.62	+ 0.28	- 0.81	+39 44 19.76
		W	...	.....	.....	48.95	50.15	25.882	37 10 42.50	+ 2.76	+ 0.28	+ 0.81	
11	ν Tauri	W	2.5	3 55 54.0	2 17.0	48.10	49.45	.....	3 10 58.85	+ 1.24	+14.47	- 37.26	+ 5 43 32.26
		E	...	4 0 17.5	2 6.5	49.55	50.95	.....	69 33 38.22	+ 2.77	-12.34	+ 37.28	
12	54 Persei	W	2.5	4 14 .....	.....	48.00	49.25	26.336	31 46 35.48	+ 0.34	- 0.22	- 4.58	+34 20 23.73
		E	...	.....	.....	49.35	50.85	26.336	40 56 10.08	+ 1.84	+ 0.22	+ 4.58	
13	υ ⁵ Eridani	E	3	4 18 30.0	2 2.1	50.20	51.20	.....	109 29 2.15	+ 3.22	- 5.46	+3 5.97	-34 14 27.93
		W	...	4 22 49.0	2 16.9	48.10	49.10	.....	323 15 35.00	+ 1.08	+ 6.87	-3 6.09	
14	53 Eridani	W	3	4 31 14.0	2 40.3	47.30	48.45	.....	342 58 36.25	+ 0.31	+13.15	-1 16.95	-14 29 31.78
		E	...	4 36 30.0	2 35.7	49.70	50.90	.....	89 46 2.12	+ 2.77	-12.41	+1 17.00	
15	ο ¹ Orionis	E	3	4 44 31.0	2 43.8	50.10	51.50	.....	61 12 3.82	+ 3.28	-26.30	+ 26.53	+14 5 30.27
		W	...	4 49 39.0	2 24.2	47.85	49.00	.....	11 32 40.02	+ 0.86	+20.38	- 26.55	
16	γ Aurigæ	W	2.5	5 0 .....	.....	47.50	48.65	29.217	38 30 35.65	- 0.22	- 0.29	+ 2.19	+41 6 28.16
		E	...	.....	.....	49.75	50.80	29.217	34 8 14.05	+ 2.03	+ 0.29	- 2.19	
17	ζ Draconis S. P.	E	4	5 6 0.0	2 31.7	50.25	51.20	.....	321 10 50.08	+ 3.24	- 4.14	-3 33.90	+65 49 37.40
		W	...	5 11 10.0	2 38.3	48.15	49.65	.....	111 33 47.48	+ 1.39	+ 4.50	+3 33.96	
18	25 Orionis	W	2.5	5 17 10.0	2 44.1	47.45	48.80	.....	359 12 38.32	+ 0.55	+18.90	- 43.55	+ 1 45 25.06
		E	...	5 22 31.0	2 36.9	50.50	51.40	.....	73 31 43.85	+ 3.50	-17.29	+ 43.55	
19	22 Camelop.	E	3	5 28 40.0	2 31.4	48.70	49.95	.....	18 59 7.52	1.81	+18.06	- 18.01	+56 18 28.48
		W	...	5 33 24.0	2 12.6	49.80	51.20	.....	53 45 26.00	+ 3.02	-13.85	+ 18.01	
20	γ Leporis	E	3.5	5 38 16.0	2 18.9	49.25	50.45	.....	97 45 1.28	+ 2.34	- 8.61	+1 45.02	-22 29 2.99
		W	...	5 43 10.0	2 35.1	49.40	50.50	.....	334 59 32.75	+ 2.46	+10.74	-1 45.06	

Time.	Ther. 1902.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point	Red. to 1906.
<i>d m s</i>	<i>°</i>	<i>°</i>	<i>mm.</i>								<i>° ' "</i>	<i>"</i>
23 5 9	45.6			9.12.16	Instrument in meridian, observation at IX with movable thread					1	66 22 20.71	
5 20	45.2			15	Instrument in meridian, observation at I with movable thread					2	20 20	+14.91
5 31	44.9	47.2	30.006							3	19.67	
16 15	11.7	31.1	29.944							4	21.00	
16 29	11.0									5	21.24	
16 45	10.8									6	21.40	
16 56	10.7									7	20.28	
17 12	10.7	11.9	29.918							8	20.74	
24 1 14	58.9	59.1	29.838							9	21.01	
1 56	57.6									10	21.90	
4 1	56.1									11	21.62	
4 12	55.9									12	21.69	+ 1.77
4 26	54.9									13	21.37	
4 35	54.2	55.8	29.811	Note						14	21.12	
4 47	53.5			7. Poor						15	21.02	+ 9.25
4 58	52.9									16	21.22	
5 12	52.7									17	21.30	
5 26	52.4									18	22.09	+ 11.48
5 42	52.1									19	21.28	+ 4.15
5 43	52.2									20	20.46	+20.36

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	7 Leporis	W	3.5	5 49 8.0	3 1.7	48.85	49.60	.....	343 16 40.98	+ 1.69	+16.98	-1 16.52	-14 11 21.53
		E	...	5 54 40.0	2 30.3	48.95	49.80	.....	89 27 52.52	+ 1.89	-11.62	+1 16.56	
2	74 G. Columbæ	W	3.5	6 0 6.0	2 24.8	49.15	50.50	.....	327 44 7.02	+ 2.35	+ 8.29	-2 26.26	-29 45 13.78
		E	...	6 5 9.0	2 38.2	48.85	50.00	.....	105 0 33.82	+ 1.89	- 9.90	+2 26.32	
3	φ ¹ Aurigæ	E	3	6 15 1.0	2 41.3	49.50	50.75	.....	25 56 54.32	+ 2.61	+39.77	- 10.61	+49 20 11.24
		W	...	6 20 7.0	2 24.7	50.20	51.45	.....	46 47 33.45	+ 3.36	-32.02	+ 10.61	
4	13 Monocerotis	W	3.5	6 25 5.0	2 46.7	49.65	51.30	.....	4 51 11.45	+ 2.98	+22.37	- 35.37	+ 7 23 56.18
		E	...	6 30 17.0	2 25.3	49.45	50.60	.....	67 53 21.32	+ 2.53	-17.00	+ 35.37	
5	February 25, L. 19 Ursæ Minoris	E	3	16 11 5.0	2 26.0	50.35	50.45	.....	359 11 38.82	+ 0.95	+ 3.59	- 44.62	+76 6 37.67
		W	...	16 16 24.0	2 53.0	50.90	51.00	.....	73 32 59.85	+ 1.50	- 5.04	+ 44.63	
6	g Herculis	W	2.5	16 26 ....	.....	50.15	50.15	23.951	39 32 45.65	+ 0.39	- 0.05	+ 3.25	+42 5 5.64
		E	...	.....	.....	49.85	49.90	.....	33 12 34.78	- 0.19	+ 0.19	- 3.25	
7	9 Camelop. s. p.	W	4	16 41 55.0	2 49.3	50.00	50.00	.....	111 12 15.22	+ 0.51	+ 5.09	+3 34.14	+66 11 9.33
		E	...	16 47 14.0	2 29.7	49.65	49.55	.....	321 32 24.75	+ 0.12	- 3.98	-3 34.13	
8	e Ursæ Minoris	E	3	16 53 5.0	2 29.2	49.65	49.80	.....	353 7 8.18	+ 0.25	+ 1.87	- 55.39	+82 11 20.89
		W	...	16 58 36.0	3 1.8	50.00	50.00	.....	79 37 30.42	+ 0.54	- 2.78	+ 55.37	
9	α Herculis (brighter)	W	3	17 7 33.0	2 50.0	49.50	49.45	.....	11 56 44.90	- 0.02	+28.71	- 26.77	+14 29 44.26
		E	...	17 13 18.5	2 55.5	49.90	49.85	.....	60 47 54.85	+ 0.42	-30.60	+ 26.77	
10	σ Ophiuchi	E	3.5	17 18 54.0	2 58.3	50.00	50.05	.....	71 4 2.95	+ 0.54	-23.63	+ 40.78	+ 4 13 15.79
		W	...	17 24 29.0	2 36.7	50.05	50.25	.....	1 40 40.90	+ 0.68	+18.26	- 40.77	
11	February 26, L. δ Persei	E	2.5	3 36 ....	.....	49.10	49.75	27.693	27 46 33.42	+ 1.84	+ 0.24	- 8.80	+47 29 18.05
		W	...	.....	.....	49.40	50.00	27.693	44 54 18.98	+ 2.11	- 0.24	+ 8.80	
12	e Persei	W	2.5	3 52 ....	.....	49.10	49.95	25.927	37 10 43.28	+ 0.63	- 0.28	+ 0.83	+39 44 19.86
		E	...	.....	.....	48.85	49.45	25.927	35 32 38.18	+ 0.25	+ 0.28	- 0.83	
13	ν Tauri	E	2.5	3 56 10.0	2 0.8	48.85	49.60	.....	69 33 37.40	+ 1.06	-11.26	+ 38.29	+ 5 43 32.71
		W	3	4 0 16.0	2 5.2	49.50	50.40	.....	3 11 2.22	+ 1.79	+12.09	- 38.32	
14	19 Ursæ Minoris s. p.	E	4	4 13 0.0	0 30.0	49.20	50.00	.....	331 26 20.40	+ 1.43	- 0.10	-2 4.90	+76 6 39.99
		W	...	4 17 4.0	3 34.0	50.30	50.90	.....	101 18 11.15	+ 2.45	+ 5.15	+2 4.95	
15	ν Eridani	W	3	4 28 47.5	2 51.5	49.35	49.90	.....	353 54 45.82	+ 1.46	+18.45	- 53.73	- 3 32 52.75
		E	...	4 34 13.0	2 34.0	49.05	49.30	.....	78 49 50.75	+ 1.02	-14.88	+ 53.75	
16	9 Camelop.	E	3	4 42 5.0	2 39.2	49.15	49.65	.....	9 6 48.38	+ 1.24	+ 9.48	- 30.31	+66 11 8.62
		W	...	4 47 33.0	2 48.8	49.80	50.30	.....	63 37 51.32	+ 1.91	-10.66	+ 30.32	
17	e Ursæ Minoris s. p.	W	3	4 53 14.0	2 20.3	49.45	49.80	.....	95 14 2.32	+ 1.46	+ 1.33	+1 37.21	+82 11 22.75
		E	...	4 58 36.0	3 1.7	48.90	49.45	.....	337 30 39.42	+ 1.01	- 2.22	-1 37.26	
18	μ Aurigæ	E	2.5	5 7 ....	.....	49.00	49.50	25.719	36 54 39.70	+ 1.66	+ 0.17	+ 0.56	+38 22 23.23
		W	...	.....	.....	49.70	50.35	25.719	35 48 53.62	+ 2.61	- 0.26	- 0.56	
19	19 Camelop.	W	3	5 25 22.0	2 49.4	49.20	49.35	.....	61 32 34.38	+ 1.12	-12.51	+ 27.75	+64 5 45.75
		E	...	5 31 26.0	3 14.6	48.40	48.80	.....	11 12 3.20	+ 0.43	+16.50	- 27.75	
20	ν Aurigæ	E	2	5 45 ....	.....	48.85	49.00	26.140	36 9 30.72	+ 1.34	+ 0.17	- 0.21	+39 7 16.29
		W	...	.....	.....	49.90	50.35	26.140	36 33 28.85	+ 2.57	- 0.17	+ 0.21	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
24 5 52	51.6	53.1	29.832	6. Instrument in meridian; W. observation at VII with movable thread; E. observation at VIII with fixed thread.					1	36 22 21.24	+18.14
6 3	51.2	.....	.....						2	21.76	+21.53
6 18	50.6	.....	.....	11, 20. Instrument in meridian, observation at II with movable thread.					3	20.74	.....
6 28	50.6	52.0	29.826	12. Instrument in meridian, observation at IX with movable thread.					4	21.82	+11.80
25 16 15	38.3	39.7	29.658	18. Instrument in meridian; E. observation at II; W. observation at I with movable thread.					5	19.84	.....
16 33	37.9	.....	.....						6	20.60	+11.85
16 45	38.1	.....	.....						7	20.86	.....
16 56	38.1	.....	.....						8	19.23	.....
17 11	37.6	.....	.....						9	19.13	.....
17 22	38.1	39.1	29.666						10	19.80	.....
26 3 34	43.3	44.0	29.724						11	21.42	.....
3 49	42.3	.....	.....						12	22.30	.....
3 59	41.6	.....	.....						13	21.64	.....
4 16	40.3	.....	.....						14	20.26	.....
4 32	39.9	41.1	29.710						15	21.32	.....
4 45	39.2	.....	.....						16	20.84	.....
4 56	38.6	.....	.....						17	21.64	.....
5 5	38.2	.....	.....						18	21.38	.....
5 29	37.3	38.7	29.688						19	21.56	- 6.44
5 41	37.2	.....	.....						20	21.56	.....

Note.
14. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	μ Orionis	W	3	5 54 26.0	2 48.9	49.20	49.40	...	7 5 53.32	+ 1.15	+24.41	- 33.11	+ 9 38 41.31
		E	...	5 59 43.0	2 28.1	49.10	49.15	...	65 38 40.98	+ 0.96	-18.76	+ 33.11	
2	k Orionis	E	3.5	6 8 42.0	2 30.2	49.90	50.00	...	62 59 41.85	+ 1.81	-20.87	+ 29.62	+12 17 45.35
		W	...	6 13 38.5	2 26.3	51.35	51.05	...	9 44 50.70	+ 3.09	+19.80	- 29.63	
3	ν Geminorum	W	3.5	6 20 31.5	2 53.7	49.75	49.70	...	17 42 57.40	+ 1.57	+37.54	- 19.97	+20 16 11.37
		E	...	6 26 5.5	2 40.3	49.30	49.40	...	55 1 37.75	+ 1.20	-31.97	+ 19.96	
4	δ Tauri	W	2.5	4 14 28.5	3 3.7	50.10	49.40	...	14 46 4.22	+ 0.20	+37.12	- 23.99	+17 19 13.79
		E	...	4 19 50.5	2 18.3	51.00	50.30	...	57 58 19.05	+ 1.12	-21.05	+ 23.99	
5	μ Eridani	W	3	4 38 3.0	2 46.6	50.45	49.55	...	354 1 52.50	+ 0.46	+17.45	- 55.20	- 3 25 49.59
		E	...	4 43 26.5	2 36.9	51.20	50.25	...	78 42 46.60	+ 1.21	-15.48	+ 55.21	
6	ι Camelop.	E	2.5	4 52 4.0	3 0.9	51.50	50.55	...	14 59 15.82	+ 1.51	+18.86	- 23.75	+60 18 25.19
		W	...	4 57 31.0	2 26.1	51.30	50.45	...	57 45 16.85	+ 1.36	-12.30	+ 23.76	
7	λ Eridani	W	3	5 1 59.0	2 41.5	50.75	49.80	...	348 35 11.60	+ 0.74	+14.76	- 1 6.82	- 8 52 43.76
		E	...	5 8 4.5	3 24.0	51.50	50.55	...	84 9 36.15	+ 1.51	-23.55	+ 1 6.83	
8	ϕ^1 Orionis	E	3	5 27 10.5	2 30.8	51.70	50.65	...	65 51 55.30	+ 1.67	-19.33	+ 34.36	+ 9 25 24.57
		W	...	5 32 10.5	2 29.2	51.40	50.65	...	6 52 41.92	+ 1.51	+18.93	- 34.37	
9	ι Tauri	W	3	5 39 12.0	2 47.2	50.55	49.90	...	15 8 27.08	+ 0.69	+31.20	- 23.63	+17 41 31.31
		E	...	5 44 38.0	2 38.8	51.25	50.20	...	57 36 9.18	+ 1.20	-28.15	+ 23.64	
10	μ Orionis	E	3	5 54 26.0	2 48.7	51.55	50.40	...	65 38 44.38	+ 1.46	-24.35	+ 34.12	+ 9 38 41.35
		W	...	5 59 53.0	2 38.3	51.45	50.10	...	7 5 56.60	+ 1.26	+21.44	- 34.13	
11	g Herculis	E	3	16 26 ....	...	50.55	50.05	27.904	33 10 32.60	+ 1.62	+ 0.19	- 3.32	+42 5 5.21
		W	...	...	...	50.90	50.15	27.904	39 30 3.40	+ 1.84	- 0.19	+ 3.32	
12	α Herculis (brighter)	E	3	17 7 32.0	2 52.8	50.40	50.20	...	60 47 53.70	+ 1.07	-29.66	+ 27.33	+14 29 43.75
		W	...	17 12 55.5	2 30.7	50.95	50.55	...	11 56 50.05	+ 1.51	+22.57	- 27.33	
13	σ Ophiuchi	W	3	17 19 46.0	2 8.1	49.55	49.20	...	1 40 49.82	+ 0.10	+12.20	- 41.67	+ 4 13 15.73
		E	...	17 23 53.0	1 58.9	50.05	49.80	...	71 3 50.28	+ 0.69	-10.51	+ 41.66	
14	μ Eridani	E	3	4 38 2.0	2 49.6	48.95	49.25	...	78 42 52.20	+ 3.65	-18.09	+ 53.03	- 3 25 49.95
		W	...	4 43 27.0	2 35.4	48.35	48.70	...	354 1 52.52	+ 3.11	+15.18	- 53.04	
15	ι Camelop.	W	3	4 52 12.0	2 54.9	47.75	47.85	...	57 45 25.30	+ 2.34	-17.63	+ 22.83	+60 18 25.35
		E	...	4 57 51.0	2 44.1	47.95	47.95	...	14 59 20.10	+ 2.49	+15.52	- 22.85	
16	λ Eridani	E	3.5	5 2 54.0	1 48.5	47.90	48.15	...	84 9 23.05	+ 2.56	- 6.66	+ 1 4.27	- 8 52 43.20
		W	...	5 7 17.0	2 34.5	47.90	48.25	...	348 35 11.88	+ 2.61	+13.51	- 1 4.30	
17	ν Orionis	E	3	5 17 21.0	2 34.7	47.85	48.10	...	73 31 44.92	+ 2.54	-16.80	+ 44.30	+ 1 45 25.37
		W	...	5 22 10.0	2 14.3	47.10	47.25	...	359 13 2.55	+ 1.69	+12.66	- 44.32	
18	ι Camelop.	W	3.5	5 28 10.0	3 2.9	46.50	46.80	...	53 45 42.62	+ 1.18	-26.35	+ 18.34	+56 18 28.58
		E	...	5 33 47.0	2 34.1	47.45	47.45	...	18 59 9.42	+ 1.97	+18.70	- 18.34	
19	ι Tauri	E	3.5	5 39 17.0	2 44.2	47.30	47.35	...	57 36 13.88	+ 1.80	-30.10	+ 22.76	+17 41 31.43
		W	...	5 44 40.5	2 39.3	46.60	46.80	...	15 8 31.35	+ 1.17	+28.33	- 22.77	

Time	Ther. (882.)	Att. ther.	Barom	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
20 5 1	37.4			11 Instrument in meridian, observation at II with movable thread.				1	36 22 21.01	+ 11.11
20 5 12	37.0							2	21 48	+ 10.41
20 5 24	36.9	17.4	29.691					3	21 24	
20 5 37	27.0	28.0	29.782					4	20 41	
20 5 41	26.9							5	21 48	
20 5 43	26.7							6	21 06	
20 5 55	26.4							7	20 61	+ 12.11
20 5 5	26.1	26.9	29.796					8	20 00	+ 11.21
20 5 10	25.7							9	20 00	+ 8.16
20 5 12	25.1							10	20 19	+ 11.26
20 5 21	21.9	26.5	29.806					11	21 08	+ 11.95
20 5 24	17.2	12.9	29.846					12	19 62	
20 5 31	11.0							13	21 28	
20 5 37	11.1	12.1	29.864					14	24 28	
20 5 41	47.2	45.1	29.892					15	24 05	
20 5 5	46.6							16	21 08	+ 17.22
20 5 6	46.2							17	21 27	+ 11.86
20 5 11	45.1							18	21 27	4.37
20 5 12	44.9	45.8	29.914					19	23.21	+ 8.52
20 5 43	44.6									

11 Instrument in meridian, observation at II with movable thread.

Notes

Very faint

Haze

One microscope reading decreased 10"

Poor, clouds

Poor, very faint

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	139 Tauri	W	3	5 49 20.7	2 52.9	45.45	45.80	.....	23 22 59.65	+ 0.10	+50.76	- 13.53	+25 56 28.48
		E	...	5 54 40.0	2 26.4	47.50	47.70	.....	49 21 33.88	+ 2.14	-36.40	+ 13.53	
2	k Orionis	W	3.5	6 8 28.0	2 45.9	46.30	46.50	.....	9 44 57.10	+ 0.89	+25.46	- 29.42	+12 17 45.59
		E	...	6 13 44.5	2 30.6	47.40	47.65	.....	62 59 45.45	+ 2.07	-20.98	+ 29.43	
3	10 Monocerotis	E	3	6 20 28.0	2 55.1	47.40	47.55	.....	79 59 29.30	+ 2.01	-18.79	+ 55.95	- 4 42 28.12
		W	...	6 25 54.5	2 31.4	47.30	47.50	.....	352 45 19.10	+ 1.93	+14.05	- 55.98	
4	φ ⁵ Aurigæ	E	3	6 40 .....	.....	47.10	47.10	25.160	31 37 15.70	+ 2.21	+ 0.21	- 4.89	+43 40 17.25
		W	...	.....	.....	47.40	47.50	25.160	41 7 7.38	+ 2.55	- 0.21	+ 4.89	
5	ε Canis Majoris	W	3.5	6 49 8.0	2 52.9	46.50	46.40	.....	340 32 6.25	+ 1.00	+14.66	-1 26.64	-16 56 12.36
		E	...	6 55 12.0	3 11.1	47.10	47.20	.....	92 12 42.70	+ 1.65	-17.91	+1 26.68	
6	45 Geminorum	E	3.5	7 0 22.5	2 40.3	47.05	47.25	.....	59 12 58.75	+ 1.66	-26.98	+ 24.85	+16 4 43.42
		W	...	7 5 46.0	2 43.2	47.10	47.20	.....	13 31 47.18	+ 1.70	+27.97	- 24.86	
7	δ Geminorum	W	3	7 11 43.0	2 51.9	46.20	46.40	.....	19 35 58.70	+ 0.84	+40.24	- 17.79	+22 9 14.02
		E	...	7 17 8.5	2 33.6	47.25	47.25	.....	53 8 39.65	+ 1.74	-32.13	+ 17.80	
8	6 Canis Minoris	E	3	7 21 51.0	2 47.2	47.00	46.90	.....	63 5 39.98	+ 1.49	-25.79	+ 29.72	+12 11 54.71
		W	...	7 27 26.0	2 47.8	47.10	47.10	.....	9 39 3.85	+ 1.62	+25.97	- 29.74	
9	26 Monocerotis	W	3.5	7 34 10.0	2 39.7	46.15	46.20	.....	348 7 49.90	+ 0.70	+14.31	-1 6.15	- 9 20 8.44
		E	...	7 39 23.0	2 33.3	47.00	47.05	.....	84 36 54.25	+ 1.52	-13.19	+1 6.18	
10	March 5, L. ζ Aurigæ	W	3	4 56 .....	.....	48.55	48.45	26.120	38 22 39.55	- 0.33	- 0.29	+ 2.11	+40 56 20.75
		E	...	.....	.....	50.00	49.80	26.120	34 20 33.38	+ 1.10	+ 0.29	- 2.11	
11	o Columbæ	E	4	5 11 28.0	2 41.0	50.60	50.25	.....	110 13 59.00	+ 2.35	- 9.38	+3 24.68	-34 59 35.09
		W	...	5 16 43.0	2 34.0	50.65	50.45	.....	322 30 47.05	+ 2.49	+ 8.58	-3 24.77	
12	22 Camelop.	W	3	5 28 35.0	2 37.6	50.20	49.35	.....	53 45 36.22	+ 1.74	-19.56	+ 18.82	+56 18 28.92
		E	...	5 34 27.0	3 14.4	49.55	49.00	.....	18 59 0.35	+ 1.21	+29.76	- 18.83	
13	139 Tauri	E	2.5	5 49 22.0	2 51.3	50.25	49.90	.....	49 21 46.68	+ 2.04	-49.82	+ 13.88	+25 56 28.20
		W	...	5 54 40.2	2 26.9	50.60	49.90	.....	23 23 11.08	+ 2.22	+36.65	- 13.88	
14	24 Ursæ Minoris S. P.	W	2.5	6 3 24.0	2 7.0	49.95	49.35	.....	90 26 11.95	+ 1.57	+ 0.44	+1 22.95	+86 59 31.22
		E	...	6 8 4.0	2 33.0	49.85	49.05	.....	342 18 34.75	+ 1.37	- 0.64	-1 23.00	
15	φ ¹ Aurigæ	W	2.5	6 15 9.5	2 34.0	49.70	49.05	.....	46 47 43.65	+ 1.33	-36.27	+ 11.09	+49 20 12.28
		E	...	6 20 14.2	2 30.7	49.40	48.80	.....	25 57 3.70	+ 1.03	+34.73	- 11.09	
16	51 Aurigæ	E	2	6 32 .....	.....	49.45	48.80	25.900	35 48 34.70	+ 1.63	+ 0.18	- 0.58	+39 28 25.90
		W	...	.....	.....	50.40	49.55	25.900	36 54 51.70	+ 2.50	- 0.18	+ 0.58	
17	φ ⁷ Aurigæ	W	2.5	6 44 .....	.....	49.60	49.15	26.538	39 19 30.88	+ 0.74	- 0.19	+ 3.13	+41 53 31.43
		E	...	.....	.....	50.00	49.40	26.538	33 23 6.70	+ 1.06	+ 0.19	- 3.13	
18	105 G. Canis Majoris	E	4	6 52 25.0	2 23.8	50.50	49.40	.....	100 33 14.25	+ 1.91	- 8.81	+2 4.27	-25 17 30.00
		W	...	6 57 16.0	2 27.2	50.80	49.55	.....	332 11 31.40	+ 2.15	+ 9.23	-2 4.28	
19	63 Aurigæ	W	2.5	7 5 .....	.....	50.30	48.95	24.773	36 55 40.30	+ 0.86	- 0.28	+ 0.58	+39 28 26.44
		E	...	.....	.....	50.50	49.50	24.773	35 49 20.78	+ 1.23	+ 0.28	- 0.58	
20	δ Geminorum	E	2.5	7 11 52.3	2 42.3	50.65	49.50	.....	53 8 43.18	+ 2.02	-35.88	+ 18.22	+22 9 13.66
		W	...	7 17 9.5	2 34.9	50.65	49.55	.....	19 36 5.22	+ 2.08	+32.67	- 18.22	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
2 5 52	44.3	...	...	4. 16. Instrument in meridian, observation at II with movable thread.						1	36 22 25.06	+ 5.75
6 12	43.6	45.3	29.912	10. 19. Instrument in meridian, observation at IX with movable thread.						2	25.00	+10.44
6 24	43.1	...	...	17. Instrument in meridian, observation at VIII with movable thread.						3	23.78	.....
6 37	42.3	...	...							4	23.72	.....
6 52	41.6	43.2	29.903							5	24.20	+18.31
7 4	41.2	...	...							6	25.14	+ 9.34
7 15	40.9	...	...							7	24.52	.....
7 25	40.6	...	...							8	23.56	+10.43
7 37	40.1	41.9	29.904							9	23.76	.....
5 4 54	36.9	37.3	30.096							10	25.85	.....
5 15	36.3	...	...							11	25.00	.....
5 39	35.4	...	...							12	24.86	- 4.47
5 52	35.4	36.5	30.116							13	24.42	+ 5.73
6 6	34.4	...	...							14	24.70	+11.73
6 18	34.3	...	...							15	24.08	.....
6 30	34.0	...	...							16	25.28	.....
6 43	33.7	34.7	30.128							17	25.77	+ 1.05
6 55	33.7	...	...							18	25.06	+20.34
7 15	33.4	...	...							19	25.58	.....
										20	24.64	.....

Notes.

5. 9. Clouds.

8. Very faint; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	6 Canis Minoris	W	3	7 23 30.0	1 7.9	49.85	48.70	...	9 39 27.22	+ 1.22	+ 4.25	- 30.42	+12 11 53.74
		E	...	7 27 23.5	2 45.6	50.50	49.30	...	63 5 40.92	+ 1.87	-25.30	+ 30.43	
2	26 Monocerotis	E	3	7 34 4.0	2 45.5	50.80	49.70	...	84 36 54.70	+ 2.21	-15.37	+1 7.67	- 9 20 8.58
	March 6, L.	W	...	7 39 25.0	2 35.5	50.70	49.70	...	348 7 50.85	+ 2.19	+13.57	-1 7.67	
3	7 Aurigæ	E	2.5	5 0 ....	...	50.00	48.80	26.077	34 10 25.88	+ 2.22	+ 0.19	- 2.28	+41 6 28.48
		W	...	...	...	50.55	49.55	26.077	38 32 44.88	+ 2.89	- 0.19	+ 2.28	
4	9 Orionis	W	2.5	5 7 24.0	2 40.5	49.65	48.45	...	349 9 4.75	+ 1.31	+14.74	-1 4.43	- 8 18 52.04
		E	...	5 12 35.0	2 30.5	49.65	48.55	...	83 35 40.68	+ 1.40	-12.96	+1 4.45	
5	7 Orionis	E	3	5 17 27.5	2 41.2	49.65	48.40	...	69 1 40.50	+ 1.33	-20.31	+ 38.26	+ 6 15 41.98
		W	...	5 22 28.0	2 19.3	50.35	49.35	...	3 43 11.58	+ 2.14	+15.17	- 38.26	
6	f Draconis s. P.	W	3.5	5 29 46.0	2 36.9	50.40	49.20	...	109 12 22.22	+ 2.04	+ 4.06	+3 11.20	+68 11 29.65
		E	...	5 34 54.0	2 31.1	49.60	48.05	...	323 32 25.88	+ 1.05	- 3.77	-3 11.22	
7	ψ ¹ Draconis s. P.	E	3.5	5 41 12.0	2 26.9	49.20	47.75	...	327 31 46.68	+ 0.78	- 3.01	-2 33.27	+72 11 30.02
		W	...	5 46 20.0	2 41.1	51.20	49.70	...	105 12 58.38	+ 2.75	+ 3.61	+2 33.28	
8	35 Draconis s. P.	W	3.5	5 51 4.0	2 37.4	50.90	49.40	...	100 26 39.70	+ 2.42	+ 2.64	+2 2.39	+76 58 20.47
		E	...	5 56 46.0	3 4.6	49.50	47.75	...	332 18 6.32	+ 0.95	- 3.62	-2 2.44	
9	δ Ursæ Minoris s. P.	E	2.5	6 2 20.0	0 13.8	48.75	47.40	...	341 55 43.68	+ 0.36	- 0.01	-1 23.48	+86 36 39.52
		W	...	6 6 10.0	3 36.2	51.15	49.85	...	90 49 0.65	+ 2.80	+ 1.44	+1 23.50	
10	10 Monocerotis	W	2.5	6 20 31.5	2 51.3	50.00	48.55	...	352 45 17.20	+ 1.56	+17.98	- 56.98	- 4 42 28.68
		E	...	6 26 8.5	2 45.7	49.65	48.20	...	79 59 28.88	+ 1.22	-16.83	+ 56.98	
11	S Monocerotis	E	3	6 33 9.0	2 42.8	49.40	48.05	...	65 18 41.92	+ 0.96	-22.89	+ 33.08	+ 9 58 48.06
		W	...	6 38 30.5	2 38.7	51.10	49.75	...	7 26 4.62	+ 2.79	+21.75	- 33.08	
12	105 G. Canis Majoris	W	3.5	6 52 3.0	2 45.7	49.30	47.90	...	332 11 28.75	+ 0.89	+11.70	-2 3.31	-25 17 29.82
		E	...	6 57 24.0	2 35.3	49.75	48.20	...	100 33 16.48	+ 1.26	-10.28	+2 3.34	
13	63 Aurigæ	E	3	7 5 ....	...	49.85	48.20	25.133	35 49 5.12	+ 2.03	+ 0.28	- 0.58	+39 28 25.92
		W	...	...	...	50.20	48.90	25.133	36 55 22.68	+ 2.58	- 0.28	+ 0.58	
14	29 Canis Majoris	W	3.5	7 12 9.0	2 40.5	49.60	48.10	...	333 5 23.35	+ 1.13	+11.14	-1 58.72	-24 23 31.08
	March 10, L.	E	...	7 17 26.0	2 36.5	49.60	48.10	...	99 39 22.88	+ 1.13	-10.59	+1 58.77	
15	χ Aurigæ	W	2.5	5 27 ....	...	50.00	50.00	25.964	29 33 49.15	+ 0.49	- 0.21	- 7.02	+32 7 19.77
		E	...	...	...	50.95	51.65	25.964	43 9 27.38	+ 1.35	+ 0.21	+ 7.02	
16	f Draconis s. P.	E	3.5	5 31 20.0	1 3.7	50.35	51.15	...	323 32 14.98	+ 1.44	- 0.67	-3 8.53	+68 11 27.97
		W	...	5 35 40.0	3 16.3	50.15	51.05	...	109 12 21.90	+ 1.30	+ 6.36	+3 8.61	
17	ψ ¹ Draconis s. P.	W	3	5 41 54.0	1 44.9	50.00	50.65	...	105 13 2.25	+ 1.06	+ 1.53	+2 31.26	+72 11 29.41
		E	...	5 46 50.0	3 11.1	51.10	51.90	...	327 31 42.12	+ 2.29	- 5.08	-2 31.30	
18	35 Draconis s. P.	E	3	5 51 20.0	2 21.5	50.80	51.50	...	332 17 59.50	+ 1.95	- 2.13	-2 0.77	+76 58 20.40
		W	...	5 56 28.0	2 46.5	49.90	50.85	...	100 26 39.82	+ 1.09	+ 2.95	+2 0.79	
19	Groombridge 1004	W	3	6 7 30.0	3 20.1	49.90	50.70	...	84 11 41.65	+ 1.06	- 1.29	+1 5.10	+86 45 41.19
		E	...	6 13 40.0	2 49.9	51.30	51.95	...	348 32 59.05	+ 2.38	+ 0.93	-1 5.12	
20	2 Geminorum	E	2.5	6 20 40.7	2 45.5	51.20	52.00	...	55 1 37.75	+ 2.39	-34.08	+ 19.95	+20 16 11.85
		W	...	6 26 10.0	2 43.8	49.75	50.50	...	17 43 2.32	+ 0.85	+33.39	- 19.96	

Time	Ther- 1882	Att ther	Barom	Observation made at V with fixed thread, except as noted below					No.	Zenith point	Red. to 1900
<i>d h m</i>	<i>° ' "</i>	<i>° ' "</i>	<i>in</i>	<i>4.</i>	<i>11.</i>	<i>15.</i>					
2 26	11.4			Instrument in meridian, observation at II with movable thread				1	16 22 25.10	+10.47	
2 47	11.2	11.9	10.148	Instrument in meridian, observation at I with movable thread				2	24.08		
4 58	19.9	42.2	10.215	Instrument in meridian, observation at IX with movable thread				3	20.18		
7 11	40.5							4	24.97		
8 29	19.1							5	25.20		
8 11	19.0							6	25.73	+11.62	
7 47	40.5	41.7	10.206					8	24.60		
7 24	19.6							7	24.18		
6 24	19.1	41.0	10.210					9	24.47		
6 16	19.2							10	25.00		
6 15	18.4							11	24.08		
7 1	18.2							12	24.47	+20.41	
7 15	37.6	18.9	10.192					13	24.90		
8 25	19.6	43.4	10.218					14	24.54	+19.67	
8 14	18.0							15	21.82		
8 15	18.0							16	22.70	+11.98	
8 54	18.9							17	22.06		
6 11	18.6							18	21.60		
6 24	18.1	19.7	10.218					19	21.08	+11.40	
								20	21.30		

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	S Monocerotis	W	3	6 33 10.0	2 41.4	49.40	50.20	.....	7 26 3.00	+ 0.57	+ 22.50	- 32.67	+ 9 58 48.40
		E	...	6 38 27.5	2 36.1	51.25	52.20	.....	65 18 35.62	+ 2.45	- 21.04	+ 32.67	
2	κ Canis Majoris	E	4	6 43 30.0	2 53.3	51.45	52.20	.....	107 39 10.30	+ 2.59	- 11.36	+ 2 52.86	- 32 24 18.74
		W	...	6 48 48.0	2 24.7	50.15	50.60	.....	325 5 27.65	+ 1.13	+ 7.92	- 2 52.89	
3	h Geminorum	E	2.5	6 58 ....	.....	51.40	52.00	26.640	45 46 36.02	+ 3.16	+ 0.19	+ 9.82	+ 29 29 38.73
		W	...	.....	.....	49.75	50.45	26.640	26 55 41.98	+ 1.59	- 0.19	- 9.82	
4	64 Aurigæ	W	2.5	7 12 ....	.....	49.55	50.35	25.656	38 29 34.75	- 0.02	- 0.29	+ 2.20	+ 41 3 1.14
		E	...	.....	.....	51.70	52.40	25.656	34 14 7.32	+ 2.05	+ 0.29	- 2.20	
5	ρ Geminorum	E	...	7 23 ....	.....	51.35	51.95	27.447	43 17 29.90	+ 3.17	+ 0.21	+ 7.22	+ 31 58 14.75
		W	...	.....	.....	49.70	50.35	27.447	29 23 42.82	+ 1.52	- 0.21	- 7.22	
6	n ¹ Puppis	W	3	7 27 40.0	2 44.0	49.40	50.15	.....	334 12 19.90	+ 0.46	+ 11.58	- 1 51.79	- 23 16 24.96
		E	...	7 32 56.0	2 32.0	51.85	52.55	.....	98 32 18.58	+ 2.94	- 10.18	+ 1 51.83	
7	4 Puppis	E	3	7 38 47.0	2 53.9	51.45	51.95	.....	89 36 54.20	+ 2.46	- 15.51	+ 1 19.23	- 14 20 22.23
		W	...	7 44 24.0	2 43.1	49.75	50.25	.....	343 7 47.65	+ 0.77	+ 13.65	- 1 19.25	
8	ω ¹ Cancri	W	3	7 54 13.0	1 5.4	49.00	49.25	.....	23 6 7.42	- 0.22	+ 7.13	- 13.99	+ 25 38 55.30
	March 17, L.	E	...	7 58 54.5	3 36.1	51.55	52.05	.....	49 39 43.95	+ 2.60	- 17.73	+ 14.02	
9	γ Orionis	W	2.5	5 17 23.5	2 44.0	50.65	50.00	.....	3 43 4.88	+ 1.23	+ 21.02	- 38.65	+ 6 15 41.89
		E	...	5 22 47.0	2 39.5	50.25	49.65	.....	69 1 38.15	+ 0.87	- 19.89	+ 38.67	
10	ε Orionis	E	2.5	5 29 3.0	2 25.8	50.50	49.80	.....	76 32 55.35	+ 1.05	- 13.97	+ 50.99	- 1 15 56.04
		W	...	5 33 49.0	2 20.2	50.70	50.05	.....	356 11 45.02	+ 1.32	+ 12.92	- 51.02	
11	κ Orionis	W	3	5 41 11.0	2 9.1	50.35	49.80	.....	347 45 37.28	+ 1.00	+ 9.29	- 1 8.55	- 9 42 26.57
		E	...	5 45 25.0	2 4.9	50.40	49.85	.....	84 59 4.38	+ 1.02	- 8.70	+ 1 8.56	
12	24 Ursæ Minoris S.P.	E	3	6 4 23.0	1 11.7	49.75	49.05	.....	342 18 31.20	+ 0.26	- 0.14	- 1 23.48	+ 86 59 30.03
		W	...	6 9 40.0	4 5.3	50.95	50.05	.....	90 26 8.15	+ 1.37	+ 1.65	+ 1 23.50	
13	κ Canis Majoris	W	3.5	6 43 38.0	2 44.5	50.10	49.45	.....	325 5 32.72	+ 0.69	+ 10.24	- 2 57.60	- 32 24 19.64
	March 18, L.	E	...	6 50 13.0	3 50.5	50.25	49.50	.....	107 39 20.05	+ 0.79	- 20.10	+ 2 57.69	
14	ε Orionis	W	3.5	5 28 28.5	3 0.2	49.05	49.15	.....	356 11 39.25	+ 0.29	+ 21.35	- 50.91	- 1 15 55.74
		E	...	5 34 1.0	2 32.3	49.75	50.15	.....	76 32 57.75	+ 1.12	- 15.25	+ 50.94	
15	κ Orionis	E	3	5 40 34.5	2 45.5	50.00	50.00	.....	84 59 10.35	+ 1.18	- 15.27	+ 1 8.50	- 9 42 26.15
		W	...	5 45 53.0	2 33.0	49.90	49.70	.....	347 45 33.85	+ 1.00	+ 13.05	- 1 8.55	
16	δ Aurigæ	W	2.5	5 49 33.0	2 16.5	49.85	49.90	.....	51 43 49.68	+ 1.08	- 17.43	+ 16.62	+ 54 16 44.15
		E	...	5 54 19.0	2 29.5	50.45	50.30	.....	21 0 48.92	+ 1.55	+ 20.91	- 16.63	
17	δ Ursæ Minoris S.P.	E	3	6 1 50.0	0 47.0	50.05	49.70	.....	341 55 42.35	+ 1.09	- 0.07	- 1 24.64	+ 86 36 39.55
	March 19, L.	W	...	6 6 0.0	3 23.0	50.40	50.20	.....	90 48 59.05	+ 1.48	+ 1.27	+ 1 24.72	
18	σ Ophiuchi	W	4	17 19 36.0	2 17.3	50.00	49.35	.....	1 40 46.35	+ 0.09	+ 14.02	- 40.94	+ 4 13 14.39
	March 20, L.	E	...	17 24 29.0	2 35.7	50.95	50.10	.....	71 4 0.00	+ 0.93	- 18.02	+ 40.94	
19	f Draconis	W	3.5	17 29 46.0	2 36.6	50.80	49.05	.....	65 38 5.02	+ 0.24	- 7.91	+ 34.16	+ 68 11 27.50
		E	...	17 35 18.0	2 55.4	51.80	50.35	.....	7 6 32.42	+ 1.44	+ 9.92	- 34.17	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
10 6 36	38.3	...	...	3.5. Instrument in meridian, observation at I with movable thread.				1	36 22 21.55	.....
6 47	38.2	...	...	4. Instrument in meridian, observation at IX with movable thread.				2	19.10	+ 22.24
6 57	38.1	...	...					3	21.62	+ 4.71
7 21	37.7	39.3	29.794					4	22.11	+ 1.19
7 31	37.4	...	...					5	21.90	.....
7 41	37.3	...	...					6	21.66	+ 19.26
8 2	37.1	38.1	29.810					7	21.60	+ 17.08
17 5 20	32.0	32.8	29.996					8	21.59	.....
5 32	31.4	...	...					9	23.14	.....
5 44	31.0	...	...					10	20.83	.....
6 8	30.2	31.4	30.022	Notes.				11	22.14	.....
6 46	29.7	30.7	30.046	8.12. Faint; clouds.				12	21.26	+ 12.61
18 5 32	36.5	38.7	30.290	14. Hazy.				13	22.24	+ 22.88
5 43	35.7	...	...	17. Very faint.				14	22.27	.....
5 52	35.3	...	...					15	22.06	.....
6 4	34.3	35.7	30.291					16	22.35	.....
19 17 22	31.2	32.1	29.344					17	22.62	.....
20 17 33	23.0	24.9	29.736					18	21.68	.....
								19	20.56	+ 13.98

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	ϕ^1 Draconis	E	3	17 41 5.0	2 33.7	51.10	49.60		3 6 43.42	+ 0.69	+ 5.59	- 40.00	+72 11 27.75
		W		17 46 4.0	2 25.3	50.60	49.05		69 37 56.85	+ 0.22	- 5.00	+ 40.02	
2	35 Draconis	W	3	17 51 3.0	2 38.5	50.85	49.10		74 24 38.75	+ 0.31	- 3.90	+ 47.75	+76 58 18.67
		E		17 56 50.0	3 8.5	51.55	49.70		358 19 59.88	+ 1.05	+ 5.51	- 47.76	
3	δ Ursæ Minoris	E	3.5	18 2 4.0	0 33.7	50.95	49.45		348 42 7.48	+ 0.52	+ 0.04	- 1 6.94	+86 36 36.95
	March 21, L.	W		18 6 20.0	3 42.3	50.85	49.20		84 2 36.30	+ 0.36	- 1.68	+ 1 6.93	
4	δ Aurigæ	E	2.5	5 49 12.0	2 37.1	49.45	49.35		21 0 46.68	+ 0.55	+ 23.08	- 16.04	+54 16 44.61
		W		5 54 6.0	2 16.9	50.60	50.65		51 43 50.05	+ 1.84	- 17.53	+ 16.04	
5	δ Ursæ Minoris S. P.	W	2.5	6 0 30.0	2 7.8	51.00	50.75		90 49 2.25	+ 2.07	+ 0.50	+ 1 21.58	+86 36 38.31
		E		6 6 10.0	3 32.2	49.65	49.40		341 55 38.38	+ 0.72	- 1.39	- 1 21.60	
6	ζ Canis Majoris	E	4	6 13 57.0	2 47.2	49.50	49.40		105 16 55.58	+ 0.62	- 11.01	+ 2 30.53	-30 1 38.63
		W		6 19 31.0	2 46.8	50.85	50.55		327 27 43.08	+ 1.92	+ 10.95	- 2 30.59	
7	ϵ Geminorum	W	3	6 35 14.2	2 56.8	49.95	49.85		22 39 50.32	+ 1.10	+ 50.64	- 14.29	+25 13 22.26
		E		6 40 41.0	2 30.0	50.00	50.00		50 4 37.35	+ 1.17	- 36.46	+ 14.29	
8	15 Lynceis	E	3	6 46 23.0	2 47.7	49.95	49.75		16 44 47.48	+ 1.02	+ 18.54	- 20.90	+58 32 52.61
		W		6 51 39.0	2 28.3	50.35	50.10		55 59 50.42	+ 1.43	- 14.49	+ 20.91	
9	γ Canis Majoris	W	3	6 56 51.0	2 41.6	50.00	50.00		341 58 16.32	+ 1.16	+ 13.13	- 1 21.70	-15 29 56.51
		E		7 2 20.0	2 47.4	49.85	49.80		90 46 26.45	+ 0.98	- 14.09	+ 1 21.68	
10	66 Aurigæ	E	3	7 18		49.90	49.55	26.247	34 25 30.98	+ 1.64	+ 0.29	- 1.98	+40 51 13.13
		W				50.65	50.40	26.247	38 17 19.95	+ 2.46	- 0.29	+ 1.98	
11	η^1 Puppis	E	4	7 27 42.0	2 40.7	49.70	49.40		98 32 23.95	+ 0.71	- 11.38	+ 1 50.70	-23 16 25.61
		W		7 33 0.0	2 37.3	50.70	50.50		334 12 17.70	+ 1.78	+ 10.90	- 1 50.73	
12	4 Puppis	W	3.5	7 39 2.0	2 37.6	50.30	50.20		343 7 46.28	+ 1.46	+ 12.74	- 1 18.45	-14 20 23.12
		E		7 44 31.0	2 51.4	49.55	49.45		89 36 57.30	+ 0.67	- 15.07	+ 1 18.47	
13	ω^1 Cancri	E	3	7 52 29.5	2 47.6	49.85	49.45		49 39 13.08	+ 0.82	- 46.78	+ 13.87	+25 38 56.49
		W		7 58 4.5	2 47.4	51.30	50.85		23 5 25.78	+ 2.29	+ 46.67	- 13.87	
14	20 Puppis	W	3.5	8 6 11.0	2 52.4	50.60	50.40		341 57 36.55	+ 1.72	+ 14.94	- 1 21.92	-15 30 33.57
		E		8 11 50.0	2 46.6	50.10	49.70		90 47 2.48	+ 1.08	- 13.95	+ 1 21.92	
15	29 Cancri	E	4	8 20 44.0	2 41.2	49.80	49.35		60 46 24.75	+ 0.73	- 25.83	+ 26.66	+14 31 11.66
		W		8 26 15.0	2 49.8	51.30	51.00		11 58 12.18	+ 2.34	+ 28.67	- 26.66	
16	6 Hydræ	W	3	8 32 49.0	2 47.9	50.80	50.45		345 19 11.30	+ 1.82	+ 15.03	- 1 12.61	-12 8 49.39
		E		8 38 14.5	2 37.6	50.25	49.90		87 25 26.80	+ 1.27	- 13.25	+ 1 12.61	
17	ρ^1 Cancri	E	3	8 44 6.0	2 56.9	49.95	49.35		46 37 11.65	+ 0.83	- 1 5.52	+ 10.63	+28 41 19.78
	March 22, L.	W		8 49 44.3	2 41.4	51.30	50.90		26 7 37.80	+ 2.33	+ 54.55	- 10.63	
18	δ Ursæ Minoris S. P.	E	4	6 0 20.0	2 18.0	49.55	49.50		341 55 35.55	+ 0.23	- 0.59	- 1 22.87	+86 36 38.54
		W		6 5 10.0	2 32.0	51.40	51.15		90 48 56.55	+ 1.98	+ 0.71	+ 1 22.93	
19	ζ Canis Majoris	W	4	6 14 4.0	2 40.1	50.65	50.80		327 27 43.58	+ 1.45	+ 10.00	- 2 33.19	-30 1 38.11
		E		6 19 30.0	2 45.9	50.55	50.55		105 16 47.55	+ 1.23	- 10.83	+ 2 33.28	
20	ϵ Geminorum	E	4	6 35 24.0	2 46.9	51.15	50.80		50 4 39.48	+ 1.67	- 45.13	+ 14.53	+25 13 23.24
		W		6 40 43.5	2 32.6	51.55	51.15		22 39 58.65	+ 2.10	+ 37.73	- 14.53	

Time	Ther. 1906.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
20 17 44	22.7		29.738	10. Instrument in meridian, observation at I with movable thread.	1	36 22 20.90	
17 55	22.4				2	20.40	
18 7	22.7	24.0	29.738		3	21.50	
21 8 54	41.5	42.8	29.621		4	22.14	
9 4	41.2				5	21.26	
9 17	40.8				6	20.54	
9 30	40.2	42.2	29.625		7	22.06	
9 40	39.6				8	22.20	
7 0	39.9				9	21.96	
7 14	39.6				10	21.92	
7 31	39.2	40.4	29.616		11	21.82	+20.22
7 42	38.9				12	21.70	+17.83
7 56	38.6				13	20.93	
8 9	38.4				14	21.41	
8 24	38.1				15	21.42	+ 0.16
8 36	38.2				16	21.48	
8 47	37.9	39.2	29.696		17	20.82	+ 5.06
9 1	38.1	40.5	29.917		18	17.24	
6 17	37.1				19	16.58	
6 38	37.2				20	17.25	

Note
18.10 Poor, diffuse and faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	15 Lyncis	W E	4 ...	6 46 27.0 6 51 54.0	2 43.6 2 43.4	51.05 51.10	50.70 50.70	..... .....	55 59 47.45 16 44 42.72	+ 1.62 + 1.60	-17.64 +17.60	+ 21.25 - 21.26	+58 32 52.55
2	7 Canis Majoris	E W	3.5 4	6 57 3.5 7 2 14.0	2 29.0 2 41.5	51.35 51.60	50.95 51.10	..... .....	90 46 14.68 341 58 12.80	+ 1.83 + 2.04	-11.16 +13.12	+1 23.14 -1 23.16	-15 29 55.30
3	f Draconis	E W	3 ...	17 29 35.0 17 35 3.0	2 47.5 2 40.5	51.35 52.05	50.00 50.80	..... .....	7 6 30.40 65 37 58.98	+ 0.40 + 1.15	+ 9.04 - 8.31	- 34.72 + 34.75	+68 11 27.26
4	ψ^1 Draconis	W E	3 ...	17 41 10.0 17 46 12.0	2 28.6 2 33.4	52.25 51.80	50.95 50.20	..... .....	69 37 49.82 3 6 38.92	+ 1.39 + 0.74	- 5.22 + 5.57	+ 40.69 - 40.71	+72 11 27.62
5	35 Draconis	E W	3 ...	17 51 19.0 17 56 30.0	2 22.5 2 48.5	51.30 52.00	49.90 50.65	..... .....	358 19 59.45 74 24 32.30	+ 0.38 + 1.07	+ 3.15 - 4.41	- 48.56 + 48.58	+76 58 18.10
6	δ Ursæ Minoris	W E	2.5 ...	18 0 20.0 18 5 55.0	2 18.3 3 16.7	52.00 51.30	50.55 49.80	..... .....	84 2 27.92 348 42 3.72	+ 1.02 + 0.26	- 0.65 + 1.31	+1 8.12 -1 8.14	+86 36 36.17
7	March 23, L. ζ Geminorum	E W	3 ...	6 56 8.0 7 1 2.5	2 25.9 2 28.6	51.30 51.55	50.85 50.90	..... .....	54 35 14.70 18 9 13.98	+ 1.59 + 1.74	-27.02 +28.04	+ 20.16 - 20.17	+20 42 23.62
8	18 Lyncis	W E	3 ...	7 4 54.0 7 10 23.0	2 50.7 2 38.3	51.55 51.55	50.90 50.95	..... .....	57 15 17.88 15 29 14.25	+ 1.75 + 1.77	-17.44 +15.00	+ 23.39 - 23.39	+59 48 25.52
9	ζ Geminorum	E W	2.5 ...	7 17 7.8 7 22 20.5	2 47.5 2 25.2	51.20 51.65	50.55 50.85	..... .....	47 19 12.10 25 25 31.42	+ 1.39 + 1.78	-55.37 +41.63	+ 11.87 - 11.87	+27 59 3.02
10	108 G. Puppis	W E	3.5 ...	7 27 24.0 7 32 45.0	2 39.8 2 41.2	51.20 51.85	50.35 51.25	..... .....	335 22 46.00 97 21 46.05	+ 1.28 + 2.10	+11.48 -11.68	-1 50.35 +1 50.39	-22 5 52.68
11	l Puppis	E W	4 ...	7 37 15.0 7 42 54.0	2 49.2 2 49.8	51.40 51.30	50.80 50.50	..... .....	103 59 21.62 328 45 8.95	+ 1.62 + 1.41	-11.52 +11.60	+2 28.23 -2 28.26	-28 44 6.58
12	3 Cancrī	W E	2.5 ...	7 52 29.0 7 58 2.0	2 57.3 2 35.7	50.80 51.80	49.70 50.60	..... .....	15 0 42.40 57 43 42.20	+ 0.74 + 1.74	+34.92 -26.93	- 24.04 + 24.05	+17 33 53.02
13	20 Puppis	E W	3 ...	8 6 15.0 8 11 38.0	2 48.0 2 35.0	51.65 51.40	50.50 50.45	..... .....	90 46 53.78 341 57 39.05	+ 1.59 + 1.46	-14.19 +12.08	+1 25.76 -1 25.76	-15 30 33.52
14	29 Cancrī	W E	3 ...	8 20 35.0 8 26 4.5	2 49.9 2 39.6	51.00 51.65	49.65 50.45	..... .....	11 58 11.82 60 46 17.60	+ 0.80 + 1.55	+28.70 -25.33	- 27.91 + 27.92	+14 31 12.38
15	6 Hydræ	E W	3.5 ...	8 32 58.0 8 38 18.0	2 38.6 2 41.4	51.55 51.35	50.35 49.95	..... .....	87 25 19.02 345 19 12.12	+ 1.48 + 1.16	-13.42 +13.89	+1 16.07 -1 16.10	-12 8 49.50
16	ρ^1 Cancrī	W E	*3 ...	8 44 44.0 8 49 30.3	2 18.5 2 27.8	50.45 51.80	49.45 50.60	..... .....	26 7 50.85 46 36 45.58	+ 0.46 + 1.71	+40.19 -45.76	- 11.14 + 11.15	+28 41 20.38
17	April 1, L. ζ Geminorum	W E	3 ...	6 55 53.0 7 1 5.5	2 39.3 2 33.2	48.65 50.95	49.45 52.05	..... .....	18 9 11.15 54 35 17.90	+ 0.23 + 2.73	+32.21 -29.79	- 19.05 + 19.06	+20 42 23.86
18	66 Aurigæ	W E	2.5 ...	7 18 ..... .....	..... .....	49.20 51.35	49.80 52.00	26.279 26.279	38 17 16.88 34 25 24.50	- 0.04 + 2.20	- 0.29 + 0.29	+ 1.95 - 1.95	+40 51 13.27
19	April 2, L. 18 Lyncis	E W	2.5 ...	7 4 57.0 7 10 31.0	2 45.6 2 48.4	50.50 50.20	51.00 50.65	..... .....	15 29 10.92 57 15 19.28	+ 1.29 + 0.98	+16.41 -16.97	- 22.17 + 22.18	+59 48 26.05

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
22 6 50	36.9	...	...	18. Instrument in meridian, observation at IX with movable thread.	1	36 22 16.67	.....
7 0	36.7	37.7	29.942		2	16.64	.....
17 33	23.2	26.1	30.250		3	15.84	+13.94
17 44	22.7	...	...		4	15.60	.....
17 54	22.7	...	...		5	15.98	.....
18 4	22.5	24.1	30.265		6	16.78	.....
23 6 59	31.3	33.3	30.411		7	16.51	.....
7 8	31.1	...	...		8	16.60	- 5.62
7 20	30.7	...	...		9	16.48	.....
7 31	30.4	...	...		10	17.64	+20.01
7 41	30.4	31.3	30.425		11	16.82	+21.19
7 56	30.0	...	...		12	17.54	+ 8.18
8 9	30.0	31.1	30.437		13	16.88	.....
8 24	29.7	...	...		14	17.58	+ 9.03
8 36	29.4	...	...	Note. 18. Thick haze.	15	17.11	.....
8 48	29.0	30.7	30.446		16	16.52	+ 4.81
1 6 59	47.5	48.7	29.738		17	17.22	.....
7 19	47.0	...	...		18	17.47	.....
7 43	...	47.9	29.742		19	15.96	- 6.04
2 7 7	50.3	52.2	30.014				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Geminorum	W	3	7 17 16.5	2 36.9	49.50	50.05	.....	25 25 26.30	+ 0.32	+48.60	- 11.25	+27 59 3.56
		E	...	7 22 32.3	2 38.9	50.70	51.35	.....	47 19 6.92	+ 1.58	-49.84	+ 11.26	
2	108 G. Puppis	E	3.5	7 27 26.0	2 35.9	50.90	51.30	.....	97 21 50.78	+ 1.69	-10.92	+1 44.64	-22 5 52.86
		W	...	7 32 44.0	2 42.1	50.25	50.40	.....	335 22 39.45	+ 0.83	+11.81	-1 44.69	
3	1 Puppis	W	4	7 37 24.0	2 38.3	49.70	50.10	.....	328 45 2.28	+ 0.41	+10.08	-2 20.62	-28 44 8.28
		E	...	7 42 34.0	2 31.7	50.90	51.35	.....	103 59 28.65	+ 1.70	- 9.26	+2 20.69	
4	ϕ Cancri	E	2.5	8 2 12.5	2 35.4	51.25	51.55	.....	49 30 27.40	+ 1.92	-40.60	+ 13.64	+25 47 30.35
		W	...	8 7 31.5	2 43.6	51.25	51.00	.....	23 13 50.90	+ 1.73	+45.00	- 13.65	
5	d^1 Cancri	W	2.5	8 15 12.5	2 46.8	50.10	50.05	.....	16 4 46.22	+ 0.59	+32.26	- 21.63	+18 37 57.20
		E	...	8 20 39.5	2 40.2	51.40	51.80	.....	56 39 42.05	+ 2.20	-29.76	+ 21.64	
6	27 B. Ursæ Majoris	E	2.5	8 29 17.0	3 3.5	51.50	51.60	.....	22 14 38.58	+ 2.08	+35.20	- 14.74	+53 2 32.18
		W	...	8 34 49.5	2 29.0	51.05	50.95	.....	50 29 39.28	+ 1.59	-23.22	+ 14.75	
7	14 Hydræ	W	3.5	8 42 4.0	2 34.9	50.45	50.50	.....	354 21 46.45	+ 1.06	+15.19	- 52.75	- 3 5 50.96
		E	...	8 48 10.0	3 31.1	50.90	51.10	.....	78 22 58.82	+ 1.54	-28.21	+ 52.80	
8	44 B. Ursæ Minoris	E	2.5	8 54 13.0	2 55.3	50.90	51.10	.....	20 37 59.65	+ 1.48	+27.81	- 16.54	+54 39 20.38
		W	...	8 59 42.5	2 34.2	51.10	51.10	.....	52 6 23.45	+ 1.61	-21.52	+ 16.54	
9	83 Cancri	W	3	9 10 59.0	2 45.8	50.15	50.05	.....	15 32 59.32	+ 0.66	+31.20	- 22.35	+18 6 8.22
		E	...	9 16 23.0	2 38.2	50.95	50.75	.....	57 11 30.08	+ 1.43	-28.40	+ 22.36	
10	ξ Leonis	E	3	9 24 12.0	2 41.5	51.30	50.85	.....	63 34 34.65	+ 1.61	-23.70	+ 30.23	+11 42 49.82
		W	...	9 29 34.0	2 40.5	51.25	50.70	.....	9 9 54.60	+ 1.58	+23.41	- 30.24	
11	ϕ Leonis	W	3	9 35 51.0	2 46.5	50.45	50.40	.....	11 53 58.15	+ 1.02	+27.50	- 26.79	+14 26 59.04
		E	...	9 41 27.5	2 50.0	51.45	51.35	.....	60 50 34.82	+ 1.94	-28.67	+ 26.79	
12	April 3, L. Geminorum	E	3	7 27 30.0	2 37.8	50.10	50.55	.....	48 11 49.55	+ 0.19	-45.91	+ 12.16	+27 6 15.17
		W	...	7 33 3.5	2 55.7	50.95	51.35	.....	24 32 27.55	+ 0.96	+56.91	- 12.17	
13	ξ Argûs	W	4	7 42 30.0	2 50.6	50.15	50.65	.....	332 50 58.35	+ 0.22	+12.54	-1 56.21	-24 37 44.60
		E	...	7 47 59.0	2 38.4	51.00	51.50	.....	99 53 30.55	+ 1.11	-10.81	+1 56.32	
14	3 Cancri	E	3	7 52 33.0	2 51.2	50.50	50.95	.....	57 43 48.98	+ 0.59	-32.55	+ 22.79	+17 33 52.96
		W	...	7 57 49.0	2 24.8	50.75	51.00	.....	15 0 51.48	+ 0.69	+23.29	- 22.81	
15	ϕ Cancri	W	3	8 2 3.0	2 44.6	50.50	50.75	.....	23 13 58.28	+ 0.39	+45.55	- 13.62	+25 47 31.12
		E	...	8 7 30.5	2 42.9	50.45	51.35	.....	49 30 31.72	+ 0.69	-44.62	+ 13.64	
16	d^1 Cancri	E	3	8 15 19.0	2 40.1	50.10	50.50	.....	56 39 41.90	+ 0.15	-29.72	+ 21.62	+18 37 57.06
		W	...	8 20 38.0	2 38.9	50.85	51.55	.....	16 4 47.52	+ 1.02	+29.28	- 21.63	
17	27 B. Ursæ Majoris	W	2.5	8 29 17.0	3 3.5	50.80	51.85	.....	50 29 50.65	+ 1.21	-35.20	+ 14.74	+53 2 32.52
		E	...	8 35 2.0	2 41.5	50.55	51.05	.....	22 14 46.30	+ 0.61	+27.27	- 14.74	
18	14 Hydræ	E	3	8 41 50.0	2 48.7	50.05	50.75	.....	78 22 48.18	+ 0.21	-18.02	+ 52.76	- 3 5 50.86
		W	...	8 47 22.0	2 43.3	50.75	51.45	.....	354 21 43.28	+ 0.97	+16.88	- 52.80	
19	44 B. Ursæ Minoris	W	3	8 54 21.0	2 47.1	50.50	51.30	.....	52 6 27.02	+ 0.69	-25.27	+ 16.55	+54 39 20.69
		E	...	8 59 55.0	2 46.9	50.50	51.20	.....	20 38 1.42	+ 0.61	+25.21	- 16.55	
20	83 Cancri	E	3	9 11 38.0	2 6.6	50.50	50.85	.....	57 11 19.42	+ 0.52	-18.19	+ 22.36	+18 6 8.52
		W	...	9 16 21.0	2 36.4	51.30	51.95	.....	15 33 1.20	+ 1.47	+27.76	- 22.37	

Time	Ther- m.	At- ther	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1906 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
2 7 10	49.7		30.022		1	16 22 16.94	
7 10	49.2				2	16.80	+20.42
7 40	48.8				3	16.96	+21.80
8 5	47.5	49.9	30.022		4	16.17	+ 4.99
8 18	47.1				5	16.78	
8 12	46.6				6	16.76	- 3.70
8 45	46.9	48.3	30.011		7	17.45	
8 52	46.8				8	16.74	- 1.82
9 14	45.1				9	17.15	
9 28	44.8				10	16.07	
9 19	44.6	46.7	30.051		11	17.18	+ 8.00
7 11	51.0	54.9	30.172		12	14.62	+ 4.59
7 45	52.3				13	16.84	
7 55	51.2				14	16.83	+ 7.81
8 11	49.9				15	16.92	+ 4.93
8 19	49.5				16	15.07	
8 25		51.3	30.166		17	15.42	- 3.04
8 12	48.9				18	15.73	
8 45	48.2				19	14.84	- 1.98
8 50	47.5				20	16.08	
9 15	46.5						
9 26		48.9	30.154				

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ξ Leonis	W	3	9 24 19.5	2 33.8	50.30	50.90	.....	9 9 58.58	+ 0.47	+21.49	- 30.23	+11 42 50.73
		E	...	9 29 41.5	2 48.2	50.50	51.05	.....	63 34 36.82	+ 0.58	-25.71	+ 30.24	
2	φ Leonis	E	3	9 35 54.0	2 43.3	50.85	51.10	.....	60 50 32.12	+ 0.77	-26.45	+ 26.80	+14 26 59.40
		W	...	9 41 27.0	2 49.7	51.15	51.70	.....	11 53 55.90	+ 1.31	+28.57	- 26.81	
3	83 B. Leonis	W	3	9 48 39.0	2 48.6	50.50	50.80	.....	6 49 42.88	+ 0.51	+24.13	- 33.38	+ 9 22 34.82
		E	...	9 54 1.0	2 33.4	50.80	51.20	.....	65 54 43.38	+ 0.81	-19.98	+ 33.37	
4	193 G. Hydræ	E	3.5	9 57 48.0	2 13.2	50.80	50.90	.....	99 5 50.08	+ 0.73	- 7.75	+1 53.77	-23 50 4.70
		W	...	10 2 42.0	2 40.8	51.35	51.50	.....	333 38 35.60	+ 1.23	+11.29	-1 53.78	
5	138 B. Ursæ Majoris	W	2.5	10 11 46.0	2 41.6	51.05	51.50	.....	52 8 26.02	+ 1.08	-23.57	+ 16.65	+54 41 21.90
		E	...	10 17 11.0	2 43.4	51.05	51.55	.....	20 36 0.95	+ 1.08	+24.09	- 16.65	
6	April 4, L. ν Geminorum	W	3.5	7 27 31.0	2 36.6	49.25	48.20	.....	24 32 40.98	+ 0.14	+45.22	- 11.66	+27 6 14.54
		E	2.5	7 33 4.5	2 56.9	52.30	51.85	.....	48 12 1.18	+ 3.53	-57.69	+ 11.66	
7	April 6, L. ν Geminorum	W	2.5	7 27 20.2	2 46.9	50.15	49.30	.....	24 32 35.60	+ 0.85	+51.34	- 12.20	+27 6 14.62
		E	...	7 32 46.5	2 39.4	51.45	50.55	.....	48 11 51.85	+ 2.22	-46.85	+ 12.20	
8	ξ Argûs	E	4	7 42 36.0	2 43.9	51.35	50.50	.....	99 53 30.48	+ 2.13	-11.57	+1 56.48	-24 37 44.28
		W	...	7 48 2.0	2 42.1	51.35	50.30	.....	332 50 59.08	+ 2.00	+11.32	-1 56.51	
9	χ Geminorum	W	3	7 55 4.3	2 39.9	50.35	49.50	.....	25 29 46.60	+ 1.11	+50.77	- 11.20	+28 3 25.90
		E	...	8 0 32.5	2 48.3	51.10	50.30	.....	47 14 51.70	+ 1.86	-56.23	+ 11.22	
10	58 Camelop.	E	3	8 10 22.0	2 28.2	50.95	49.70	.....	17 15 19.85	+ 1.51	+15.06	- 20.25	+58 2 17.28
		W	...	8 15 34.0	2 43.8	51.30	50.40	.....	55 29 13.75	+ 2.03	-18.40	+ 20.26	
11	θ Cancrî	W	3	8 23 27.0	2 46.8	50.50	49.35	.....	15 51 27.40	+ 1.10	+31.97	- 21.88	+18 24 37.92
		E	...	8 28 58.5	2 44.7	50.80	49.50	.....	56 53 3.78	+ 1.32	-31.17	+ 21.89	
12	γ Cancrî	E	3	8 35 4.7	2 45.8	50.90	49.50	.....	53 29 30.75	+ 1.39	-36.80	+ 18.03	+21 48 19.73
		W	...	8 40 33.0	2 42.5	51.35	50.10	.....	19 15 0.55	+ 1.90	+35.34	- 18.04	
13	60 Cancrî	W	3.5	8 48 4.0	2 43.4	50.20	49.10	.....	9 26 3.85	+ 0.75	+24.46	- 29.75	+11 58 59.10
		E	...	8 53 26.5	2 39.1	50.70	49.45	.....	63 18 26.42	+ 1.20	-23.20	+ 29.77	
14	ω Hydræ	E	3.5	8 58 12.0	2 49.2	50.60	49.30	.....	69 49 20.40	+ 1.12	-21.93	+ 38.71	+ 5 27 55.38
		W	...	9 3 46.0	2 44.8	50.85	49.70	.....	2 55 12.45	+ 1.44	+20.81	- 38.73	
15	h Mali	W	4	9 14 48.0	2 31.7	49.90	48.80	.....	331 54 41.02	+ 0.48	+ 9.76	-2 2.21	-25 34 11.70
		E	...	9 20 13.0	2 53.3	50.35	49.10	.....	100 49 55.20	+ 0.82	-12.74	+2 2.25	
16	160 G. Hydræ	E	4	9 26 16.0	2 36.8	50.50	49.20	.....	95 58 18.08	+ 0.97	-11.31	+1 39.75	-20 42 14.04
		W	...	9 31 33.0	2 40.2	50.65	49.15	.....	336 46 13.28	+ 1.01	+11.81	-1 39.77	
17	θ Antliæ	W	4	9 37 22.0	2 38.9	50.40	49.00	.....	330 8 24.68	+ 0.82	+10.40	-2 12.62	-27 20 36.66
		E	...	9 42 47.0	2 46.1	49.85	48.55	.....	102 36 8.10	+ 0.29	-11.36	+2 12.66	
18	April 7, L. α Geminorum (2nd star)	E	2.5	7 29 ....	.....	50.20	49.85	26.727	43 10 30.10	+ 2.84	+ 0.13	+ 6.80	+32 5 40.24
		W	...	.....	.....	49.00	48.85	26.727	29 31 32.42	+ 1.77	- 0.13	- 6.80	
19	κ Geminorum	W	2.5	7 36 4.5	2 41.0	48.40	48.10	.....	22 3 56.35	+ 0.52	+40.47	- 14.50	+24 37 21.03
		E	...	7 41 35.5	2 50.0	50.90	50.60	.....	50 40 41.45	+ 3.01	-45.11	+ 14.51	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1006.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
3 9 27	46.5	.....	.....	18. Instrument in meridian, observation at II with movable thread.				1	36 22 16.12	.....
9 39	45.8	.....	.....					2	16.10	+ 8.03
9 51	45.8	.....	.....					3	15.86	+ 9.25
10 1	45.9	.....	.....					4	15.58	+10.07
10 15	45.5	47.1	30.141					5	14.82	- 2.39
4 7 31	67.5	68.3	29.770					6	16.68	+ 4.52
6 7 30	45.6	46.4	29.798					7	17.50	+ 4.36
7 45	45.5	.....	.....					8	16.70	.....
7 58	45.2	.....	.....					9	17.90	.....
8 13	44.5	45.5	29.820					10	16.90	- 5.83
8 26	44.2	.....	.....					11	17.20	+ 7.08
8 38	43.8	.....	.....					12	16.56	.....
8 51	43.6	44.3	29.836					13	16.75	+ 9.00
9 1	43.2	.....	.....	Note.				14	17.14	+10.91
9 18	42.7	.....	.....	6 W. Faint, through haze.				15	17.29	.....
9 29	42.6	.....	.....					16	16.91	+17.00
9 40	42.3	43.7	29.842					17	16.48	+17.80
7 7 27	57.8	59.3	29.806					18	17.56	.....
7 39	57.5	.....	.....					19	18.35	.....
7 58	56.9	.....	.....					

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Germinorum	E	2.5	7 55 0.0	2 44.0	50.85	50.55	.....	47 14 47.18	+ 2.97	-53.41	+ 10.94	+28 3 25.94
	April 12, L.	W	...	8 0 36.0	2 52.0	48.95	48.60	.....	25 29 37.65	+ 1.04	+58.74	- 10.94	
2	α Geminorum (2nd star)	W	2.5	7 29 ....	.....	49.00	49.00	26.803	29 31 31.25	+ 0.87	- 0.21	- 6.76	+32 5 40.56
		E	...	.....	.....	49.00	49.00	26.803	43 10 29.32	+ 0.81	+ 0.21	+ 6.76	
3	κ Geminorum	E	2	7 36 5.5	2 38.7	48.80	48.85	.....	50 40 36.65	+ 1.36	-39.33	+ 14.42	+24 37 20.86
		W	...	7 41 29.0	2 44.8	49.35	49.35	.....	22 3 51.80	+ 1.97	+42.39	- 14.43	
4	μ Cancri	W	2.5	7 59 30.3	2 41.6	47.70	47.85	.....	19 17 55.82	+ 0.36	+35.04	- 17.41	+21 51 12.42
		E	...	8 4 50.5	2 38.6	49.55	50.05	.....	53 26 36.02	+ 2.35	-33.75	+ 17.42	
5	58 Camelop.	W	2	8 10 4.0	2 44.6	48.60	48.70	.....	55 29 16.58	+ 1.22	-18.58	+ 10.67	+58 2 17.78
		E	...	8 15 42.5	2 53.9	49.35	49.55	.....	17 15 13.30	+ 2.04	+20.74	- 10.67	
6	θ Cancri	E	3	8 23 34.0	2 38.3	49.20	49.30	.....	56 53 1.50	+ 1.83	-28.79	+ 21.25	+18 24 38.52
		W	...	8 29 4.7	2 52.4	49.30	49.40	.....	15 51 24.92	+ 1.95	+34.15	- 21.26	
7	γ Cancri	W	2	8 35 7.7	2 41.3	48.45	48.25	.....	19 15 2.80	+ 0.91	+34.83	- 17.51	+21 48 19.94
		E	...	8 40 35.7	2 46.7	49.50	49.60	.....	53 29 31.75	+ 2.16	-37.20	+ 17.51	
8	60 Cancri	E	2	8 48 4.0	2 41.9	49.00	49.25	.....	63 18 27.62	+ 1.66	-24.02	+ 28.90	+11 58 59.50
		W	...	8 53 27.0	2 41.1	49.65	49.50	.....	9 26 3.10	+ 2.10	+23.78	- 28.90	
9	ω Hydrae	W	3	8 58 11.0	2 48.7	49.15	49.15	.....	2 55 11.75	+ 1.73	+21.81	- 37.57	+ 5 27 55.72
		E	...	9 3 51.0	2 51.3	49.00	49.35	.....	69 49 22.50	+ 1.76	-22.48	+ 37.58	
10	h Mali	E	4	9 14 35.0	2 43.2	49.15	49.30	.....	100 49 58.12	+ 1.74	-11.30	+ 58.55	-25 34 12.25
		W	...	9 20 4.0	2 45.8	49.90	49.65	.....	331 54 34.10	+ 2.33	+11.66	- 58.56	
11	160 G. Hydrae	W	4	9 26 20.0	2 31.3	49.40	49.30	.....	336 46 10.05	+ 1.88	+10.53	- 36.72	-20 42 15.33
		E	...	9 31 39.0	2 47.7	49.30	49.30	.....	95 58 23.85	+ 1.84	-12.94	+ 36.73	
12	θ Antliae	E	4	9 37 4.0	2 55.4	49.30	49.45	.....	102 36 14.12	+ 1.90	-12.67	+ 8.57	-27 20 37.56
		W	...	9 42 34.0	2 34.6	49.75	49.80	.....	330 8 20.22	+ 2.32	+ 9.84	- 8.65	
13	83 B. Leonis	E	3	9 48 44.5	2 41.0	49.35	49.60	.....	65 54 47.15	+ 2.04	-22.01	+ 32.32	+ 9 22 35.10
		W	...	9 53 49.0	2 23.5	49.75	49.75	.....	6 49 49.12	+ 2.37	+17.48	- 32.34	
14	193 G. Hydrae	W	4	9 57 51.0	2 8.1	49.20	49.00	.....	333 38 36.42	+ 1.65	+ 7.16	- 50.26	-23 50 5.66
		E	...	10 2 51.0	2 51.9	49.70	49.85	.....	99 5 59.72	+ 2.30	-12.90	+ 50.26	
15	138 B. Ursae Majoris	E	3	10 11 48.0	2 37.4	49.35	49.15	.....	20 36 2.70	+ 1.77	+22.36	- 16.12	+54 41 23.86
	April 13, L.	W	...	10 17 11.0	2 45.6	50.05	49.90	.....	52 8 31.42	+ 2.54	-24.75	+ 10.13	
16	μ Cancri	E	3	7 59 32.0	2 39.6	48.90	48.90	.....	53 26 36.02	+ 1.06	-34.18	+ 17.50	+21 51 12.58
		W	...	8 5 2.0	2 50.4	50.00	50.25	.....	19 17 48.82	+ 2.38	+38.96	- 17.60	
17	η Cancri	W	2.5	8 24 30.5	2 43.7	49.65	49.65	.....	18 12 18.92	+ 1.81	+34.10	- 18.85	+20 45 33.81
		E	...	8 30 6.0	2 51.8	49.30	49.10	.....	54 32 18.80	+ 1.35	-37.57	+ 18.86	
18	α Mali	E	4	8 37 10.0	2 36.9	48.50	48.20	.....	108 6 0.30	+ 0.46	- 9.24	+ 52.45	-32 51 10.24
		W	...	8 42 38.0	2 51.1	50.20	50.10	.....	324 38 29.65	+ 2.33	+10.98	- 52.50	
19	ζ Hydrae	W	2.5	8 47 42.5	2 40.9	49.60	49.50	.....	3 45 19.98	+ 1.77	+20.25	- 36.85	+ 6 18 3.08
		E	...	8 53 13.5	2 50.1	48.80	48.50	.....	68 59 16.98	+ 0.85	-22.64	+ 36.89	
20	145 B. Lyncis	E	2	9 1 ....	.....	48.40	48.30	27.018	36 26 25.08	+ 1.22	+ 0.27	+ 0.09	+38 49 42.36
		W	...	.....	.....	49.80	49.70	27.018	36 15 15.95	+ 2.70	- 0.27	- 0.09	

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>								<i>° ' "</i>	<i>"</i>
7 12	61.2	61.2	29.812	Instrument in meridian, observation at IX with movable thread.						1	10 22 17.08	.....
11 26	61.6	61.6	29.974	Instrument in meridian, observation at I with movable thread.						2	18 22	.....
7 19	61.2	.....	.....							3	17 42	.....
8 2	61.6	.....	.....							4	17 02	+ 5.81
8 11	61.2	.....	.....							5	17 05	+ 6.21
8 22	60.9	61.8	29.968							6	17 28	+ 6.83
8 16	60.5	.....	.....							7	17 02	.....
8 41	60.0	.....	.....							8	17 12	+ 8.79
9 1	60.0	.....	.....							9	18 54	+ 10.78
9 18	59.7	61.7	29.982							10	18 12	.....
9 29	59.9	.....	.....							11	17 01	+ 12.40
9 40	59.6	.....	.....							12	17 32	+ 18.17
9 51	58.6	.....	.....							13	18 06	+ 8.79
10 1	58.6	.....	.....							14	17 18	+ 16.85
10 14	58.6	59.8	29.994							15	18 02	+ 4.21
11 3	57.8	59.8	30.028							16	16 52	+ 5.82
11 28	59.2	.....	.....							17	18 71	.....
11 45	55.1	.....	.....							18	17 18	.....
11 56	54.9	57.1	30.056							19	18 02	.....
12 5	51.9	.....	.....							20	18 36	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	38 Lyncis	W E	3 ...	9 13 .... .....	..... .....	49.95 48.50	49.80 48.45	24.276 24.276	34 39 29.70 38 5 56.78	+ 1.53 + 0.13	- 0.16 + 0.16	- 1.74 + 1.74	+37 12 1.80
2	10 Leonis Minoris	E W	2.5 ...	9 28 .... .....	..... .....	48.20 50.05	47.95 49.90	28.093 28.093	38 26 26.85 34 13 46.22	+ 0.79 + 2.81	+ 0.16 - 0.16	+ 2.13 - 2.13	+36 48 54.90
3	14 Leonis Minoris	W E	2 ...	9 41 .... .....	..... .....	50.05 48.65	49.90 48.30	24.187 24.187	43 0 30.15 29 45 3.75	+ 1.57 + 0.08	- 0.22 + 0.22	+ 6.73 - 6.73	+45 33 7.00
4	ν Leonis	E W	3 ...	9 50 27.0 9 56 4.0	2 41.1 2 55.9	48.05 50.45	47.85 50.30	..... .....	62 24 1.85 10 20 26.58	+ 0.06 + 2.56	-24.46 +29.17	+ 28.26 - 28.27	+12 53 28.70
5	λ Hydræ	W E	3.5 ...	10 3 16.0 10 8 40.0	2 42.7 2 41.3	50.10 48.55	49.70 48.35	..... .....	345 34 21.20 87 10 11.88	+ 2.07 + 0.58	+14.18 -13.94	-1 10.91 +1 10.92	-11 53 34.91
6	42 Leonis	E W	3 ...	10 14 5.0 10 19 22.5	2 40.3 2 37.2	48.05 50.20	47.60 50.00	..... .....	59 50 43.15 12 53 51.55	- 0.03 + 2.37	-26.38 +25.37	+ 25.15 - 25.16	+15 26 52.66
7	44 Hydræ	W E	3.5 ...	10 26 53.0 10 32 21.0	2 38.1 2 49.9	49.55 48.80	49.35 48.40	..... .....	334 12 44.62 98 31 49.58	+ 1.64 + 0.83	+11.02 -12.72	-1 49.29 +1 49.30	-23 15 52.06
8	April 16, L. γ Crateri	E W	2.5 ...	8 24 27.5 8 29 51.5	2 41.2 2 42.8	49.15 50.25	48.25 49.40	..... .....	54 32 14.32 18 12 17.90	+ 0.68 + 1.82	-33.07 +33.73	+ 19.09 - 19.10	+20 45 33.20
9	α Mali	W E	3.5 ...	8 37 12.0 8 42 24.0	2 29.4 2 42.6	49.55 49.10	48.65 48.40	..... .....	324 38 36.55 108 5 59.48	+ 1.11 + 0.71	+ 8.38 - 9.92	-2 54.55 +2 54.63	-32 51 10.16
10	ζ Hydræ	E W	3 ...	8 47 41.0 8 53 4.5	2 37.0 2 46.5	49.15 50.15	48.40 49.35	..... .....	68 59 12.52 3 45 18.38	+ 0.80 + 1.80	-19.28 +21.69	+ 37.28 - 37.31	+6 18 3.16
11	145 B. Lyncis	W E	2.5 ...	9 1 .... .....	..... .....	49.90 48.95	48.85 48.10	27.012 27.012	36 15 19.28 36 26 26.20	+ 0.69 - 0.23	- 0.27 + 0.27	- 0.09 + 0.09	+38 49 43.18
12	38 Lyncis	E W	3 ...	9 13 .... .....	..... .....	48.95 50.25	48.15 49.45	24.266 24.266	38 5 54.98 34 39 29.92	+ 1.33 + 2.64	+ 0.25 - 0.25	+ 1.76 - 1.76	+37 12 2.66
13	10 Leonis Minoris	W E	3 ...	9 28 .... .....	..... .....	49.35 48.95	48.70 48.00	28.144 28.144	34 13 47.18 38 26 25.28	+ 0.35 - 0.28	- 0.25 + 0.25	- 2.15 + 2.15	+36 48 55.40
14	14 Leonis Minoris	E W	2.5 ...	9 41 .... .....	..... .....	49.25 50.00	48.50 48.95	24.192 24.192	29 45 1.98 43 0 30.02	+ 1.62 + 2.21	+ 0.35 - 0.35	- 6.80 + 6.80	+45 33 7.30
15	ν Leonis	W E	3 ...	9 50 28.5 9 55 57.0	2 34.2 2 54.3	49.15 49.75	48.20 49.00	..... .....	10 20 36.40 62 24 4.90	+ 0.67 + 1.35	+22.41 -28.64	- 28.54 + 28.54	+12 53 28.94
16	λ Hydræ	E W	3.5 ...	10 3 28.0 10 8 30.0	2 25.2 2 36.8	49.70 50.00	48.80 49.00	..... .....	87 10 7.72 345 34 23.30	+ 1.24 + 1.50	-11.30 +13.17	+1 11.60 -1 11.60	-11 53 34.90
17	42 Leonis	W E	3 ...	10 14 5.0 10 19 29.5	2 35.0 2 49.5	49.35 49.60	48.40 48.65	..... .....	12 53 54.48 59 50 45.15	+ 0.93 + 1.14	+24.67 -29.50	- 25.40 + 25.40	+15 26 52.78
18	44 Hydræ	E W	3 ...	10 26 48.0 10 32 18.0	2 37.8 2 52.2	49.50 49.60	48.65 48.75	..... .....	98 31 46.38 334 12 44.22	+ 1.13 + 1.19	-10.97 +13.07	+1 50.34 -1 50.37	-23 15 52.84
19	α Crateris	E W	3 ...	10 52 30.0 10 58 2.0	2 34.9 2 57.1	49.30 49.60	48.35 48.55	..... .....	93 4 22.65 339 40 8.18	+ 0.82 + 1.06	-11.59 +15.16	+1 28.94 -1 28.96	-17 48 6.15
20	β Crateris	W E	3.5 ...	11 4 18.0 11 9 39.0	2 37.4 2 43.6	49.00 49.80	47.95 48.70	..... .....	335 9 37.95 97 34 57.12	+ 0.52 + 1.28	+11.09 -11.98	-1 46.26 +1 46.28	-22 18 58.16

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red to 1906 c.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	
13 9 10	53.9	...	...	1, 3. Instrument in meridian, observation at VIII with movable thread.	1	30 22 17.98	+ 0.18
9 26	53.5	...	...	2. Instrument in meridian, observation at II with movable thread.	2	18.12	
9 38	53.0	55.2	30.056	11, 13. Instrument in meridian, observation at IX with movable thread.	3	18.04	- 2.27
9 53	52.7	...	...	12, 14. Instrument in meridian, observation at I with movable thread.	4	17.88	+ 7.71
10 6	52.4	...	...		5	17.99	
10 17	52.3	...	...		6	18.01	+ 6.08
10 30	52.2	54.1	30.056		7	17.49	+ 15.54
16 8 27	49.8	51.7	30.029		8	17.68	
8 40	49.5	...	...		9	18.20	
8 50	49.1	...	...		10	17.94	
8 59	48.5	...	...		11	18.00	
9 11	48.0	50.3	30.041		12	17.94	- 0.07
9 26	47.6	...	...		13	18.12	
9 39	47.9	...	...		14	18.38	- 2.04
9 53	47.0	48.9	30.046	Note. 6. Very faint.	15	18.54	+ 7.57
10 6	47.7	...	...		16	17.82	
10 17	47.6	...	...		17	18.44	+ 0.52
10 29	47.5	...	...		18	17.50	+ 15.85
10 41	47.2	...	...		19	18.13	
10 55	47.0	...	...		20	18.00	
11 7	46.7	47.8	30.045				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
April 18, L.													
1	δ Cancri	W	2.5	<i>h m s</i> 8 36 50.0	<i>m s</i> 2 23.2	<i>d</i> 48.00	<i>d</i> 48.05	<i>r</i>	15 56 51.98	+ 1.00	+23.64	- 20.87	+18 29 54.28
		E	...	8 42 8.5	2 55.3	49.05	49.45	.....	56 47 52.52	+ 2.31	-35.43	+ 20.88	
2	α Cancri	E	2.5	8 50 33.0	2 40.4	49.25	49.50	.....	63 4 17.32	+ 2.34	-23.75	+ 28.20	+12 13 11.07
		W	...	8 56 1.0	2 47.6	48.50	48.70	.....	9 40 13.92	+ 1.54	+25.93	- 28.22	
3	ξ Cancri	W	2.5	9 1 7.5	2 42.5	47.80	48.15	.....	19 52 10.40	+ 0.91	+36.46	- 16.65	+22 25 28.94
		E	...	9 6 41.7	2 51.7	49.45	49.90	.....	52 52 27.70	+ 2.67	-40.71	+ 16.65	
4	Δ Hydræ	E	3	9 27 10.0	2 34.1	49.40	49.75	.....	80 46 46.38	+ 2.58	-14.33	+ 55.04	- 5 29 55.26
		W	...	9 33 22.0	3 37.9	48.70	48.95	.....	351 57 30.02	+ 1.86	+28.65	- 55.06	
5	23 Leonis	W	3	9 43 7.5	2 42.2	47.85	47.90	.....	10 57 16.35	+ 0.86	+25.29	- 26.74	+13 30 14.46
		E	...	9 48 42.5	2 52.8	49.50	49.70	.....	61 47 19.25	+ 2.63	-28.71	+ 26.75	
6	π Leonis	E	3	9 52 37.0	2 30.7	49.30	49.65	.....	66 47 42.02	+ 2.53	-18.82	+ 33.06	+ 8 29 35.56
		W	...	9 58 4.3	2 56.6	48.50	48.60	.....	5 56 42.55	+ 1.52	+25.84	- 33.07	
7	22 Sextantis	W	3	10 10 18.5	2 32.1	47.35	47.40	.....	349 51 38.50	+ 0.38	+13.41	- 59.37	- 7 36 9.44
		E	...	10 15 44.0	2 53.4	49.00	49.80	.....	82 53 0.20	+ 2.73	-17.43	+ 59.39	
8	α Antliæ	E	3	10 20 7.0	2 37.4	49.45	49.65	.....	105 50 49.78	+ 2.56	- 9.66	+ 29.45	-30 35 37.17
		W	...	10 25 46.0	3 1.6	48.30	48.35	.....	326 53 39.98	+ 1.36	+12.86	- 29.49	
9	37 Leonis Minoris	W	2.5	10 33 .....	.....	47.85	48.05	24.240	29 55 27.98	+ 0.23	- 0.22	- 6.39	+32 27 51.73
		E	...	.....	.....	49.55	49.90	24.240	42 50 2.05	+ 1.96	+ 0.22	+ 6.39	
10	37 Sextantis	E	3	10 38 15.0	2 50.2	49.50	49.50	.....	68 25 21.25	+ 2.53	-22.09	+ 35.34	+ 6 51 59.12
		W	...	10 43 47.0	2 41.8	48.00	48.15	.....	4 19 14.78	+ 1.07	+20.78	- 35.35	
11	α Crateris	W	3	10 52 30.0	2 35.0	47.30	47.70	.....	339 40 10.02	+ 0.42	+11.61	- 1 25.79	-17 48 6.47
		E	...	10 57 55.0	2 50.0	49.95	50.10	.....	93 4 27.40	+ 3.03	-13.96	+ 1 25.81	
12	β Crateris	E	3.5	11 4 28.0	2 27.5	49.40	49.40	.....	97 34 57.95	+ 2.41	- 9.74	+ 1 42.49	-22 18 58.60
		W	...	11 9 53.0	2 57.5	48.05	48.15	.....	335 9 30.15	+ 1.12	+14.11	- 1 42.54	
April 19, L.													
13	δ Cancri	E	2.5	8 37 7.5	2 5.7	47.55	48.30	.....	56 47 35.32	+ 0.80	-18.22	+ 20.67	+18 29 54.64
		W	...	8 42 5.5	2 52.3	48.35	48.95	.....	15 56 39.75	+ 1.47	+34.23	- 20.69	
14	α Cancri	W	3	8 50 26.0	2 47.4	47.55	48.40	.....	9 40 14.32	+ 0.76	+25.86	- 27.95	+12 13 11.18
		E	...	8 56 3.5	2 50.1	47.45	48.10	.....	63 4 21.90	+ 0.55	-26.71	+ 27.97	
15	ξ Cancri	E	3	9 1 7.5	2 42.5	47.25	47.95	.....	52 52 24.60	+ 0.39	-36.46	+ 16.40	+22 25 29.62
		W	...	9 6 41.0	2 51.0	48.55	49.40	.....	19 52 5.55	+ 1.77	+40.37	- 16.50	
16	Δ Hydræ	W	3.5	9 27 17.0	2 27.1	47.40	48.20	.....	351 57 46.78	+ 0.68	+13.06	- 54.49	- 5 29 55.45
		E	...	9 32 20.0	2 35.9	47.95	48.50	.....	80 46 49.12	+ 1.06	-14.67	+ 54.50	
17	23 Leonis	E	3	9 43 6.5	2 43.2	47.45	47.95	.....	61 47 18.15	+ 0.55	-25.61	+ 26.48	+13 30 14.52
		W	...	9 48 41.5	2 51.8	48.10	48.65	.....	10 57 12.42	+ 1.23	+28.37	- 26.50	
18	π Leonis	W	3	9 52 34.0	2 33.7	47.60	48.45	.....	5 56 48.90	+ 0.85	+10.58	- 32.76	+ 8 29 35.34
		E	...	9 58 8.5	3 0.8	47.60	48.20	.....	66 47 52.50	+ 0.79	-27.08	+ 32.77	
19	22 Sextantis	E	3.5	10 10 12.0	2 38.6	47.55	47.70	.....	82 53 0.15	+ 0.46	-14.58	+ 58.82	- 7 36 9.96
		W	...	10 15 44.0	2 53.4	48.80	49.00	.....	349 51 31.50	+ 1.79	+17.43	- 58.86	
20	α Antliæ	W	3.5	10 20 3.0	2 41.3	48.25	48.75	.....	326 53 41.05	+ 1.39	+10.15	- 2 28.11	-30 35 37.56
		E	...	10 25 33.0	2 48.7	47.35	47.70	.....	105 50 55.28	+ 0.34	-11.10	+ 2 28.15	

Time	Ther- 1906	Att. ther	Barom	Observation made at V with fixed thread, except as noted below.	No	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
15 8 40	68.5	70.1	30.039	9. Instrument in meridian, observation at IX with movable thread	1	36 22 18.02	.....
8 51	67.9	.....	.....		2	18.64	.....
9 4	67.2	.....	.....		3	18.72	+ 4.75
9 10	66.6	69.0	30.033		4	17.87	+13.50
9 46	66.2	.....	.....		5	17.84	+ 7.30
9 52	66.0	.....	.....		6	17.82	.....
10 03	65.2	.....	.....		7	18.00	.....
10 23	64.1	66.7	30.034		8	18.42	.....
10 41	64.6	.....	.....		9	18.85	.....
10 55	64.4	.....	.....		10	18.70	.....
11 7	64.0	66.9	30.034		11	19.27	.....
12 8 40	70.6	72.1	29.934		12	19.08	.....
8 51	69.8	.....	.....		13	16.66	.....
9 4	69.1	.....	.....		14	18.15	.....
9 10	69.1	70.2	29.930		15	18.10	+ 4.63
9 46	68.4	.....	.....		16	18.02	+13.45
9 52	68.0	.....	.....		17	17.64	+ 7.19
10 11	67.3	.....	.....		18	17.78	.....
10 23	67.0	68.7	29.931		19	18.46	.....
					20	18.58	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	37 Leonis Minoris	E W	3 ...	10 33 ... ...	... ...	47.35 48.95	47.65 49.15	24.287 24.287	42 50 2.65 29 55 23.92	+ 0.99 + 2.68	+ 0.22 - 0.22	+ 6.33 - 6.33	+32 27 51.47
2	37 Sextantis	W E	3.5 ...	10 38 43.0 10 43 46.5	2 22.2 2 41.3	48.50 47.50	48.85 47.75	..... .....	4 19 18.78 68 25 20.88	+ 1.55 + 0.48	+16.05 -20.65	- 35.04 + 35.06	+ 6 51 59.32
3	<i>d</i> Leonis	E W	3 ...	10 53 25.0 10 58 22.5	2 10.6 2 46.9	47.65 49.05	47.85 49.45	..... .....	71 9 56.22 1 34 30.55	+ 0.52 + 2.08	-12.65 +20.65	+ 38.93 - 38.95	+ 4 7 12.20
4	<i>n</i> Leonis	W E	3 ...	11 8 9.5 11 13 48.0	2 40.6 2 57.9	48.45 47.80	48.90 48.00	..... .....	11 16 9.45 61 28 30.75	+ 1.47 + 0.70	+25.05 -30.74	- 26.29 + 26.31	+13 49 7.87
5	April 24, L. 28 Hydræ	E W	2.5 ...	9 18 7.0 9 23 25.0	2 27.9 2 50.1	49.85 48.20	49.40 47.80	..... .....	79 59 48.45 352 44 42.88	+ 2.54 + 0.83	-13.41 +17.73	+ 54.11 - 54.15	- 4 42 55.65
6	<i>κ</i> Hydræ	W E	3 ...	9 33 4.0 9 38 31.0	2 37.0 2 50.0	47.50 49.65	47.05 49.50	..... .....	343 33 30.60 89 11 8.88	+ 0.12 + 2.45	+12.74 -14.93	-1 14.87 +1 14.92	-13 54 34.81
7	6 Sextantis	E W	3 ...	9 44 25.0 9 48 31.0	1 57.9 2 8.1	48.00 49.80	47.80 49.25	..... .....	79 5 12.92 353 39 20.98	+ 0.74 + 2.41	- 8.68 +10.24	+ 52.55 - 52.58	- 3 48 21.69
8	<i>ν</i> ² Hydræ	W E	3 ...	9 57 45.0 10 3 23.0	2 41.0 2 57.0	48.95 48.30	48.85 48.10	..... .....	344 51 14.60 87 53 24.65	+ 1.76 + 1.06	+13.71 -16.57	-1 11.63 +1 11.65	-12 36 44.63
9	29 Sextantis	E W	3.5 ...	10 22 9.0 10 27 22.0	2 26.5 2 46.5	48.30 50.15	47.80 49.40	..... .....	77 32 37.88 355 11 53.88	+ 0.88 + 2.69	-13.82 +17.85	+ 49.90 - 49.92	- 2 15 38.62
10	33 Sextantis	W E	3 ...	10 33 50.0 10 39 9.5	2 40.5 2 39.0	49.30 48.30	49.15 48.00	..... .....	356 12 32.65 76 32 4.05	+ 2.06 + 0.95	+16.94 -16.62	- 48.21 + 48.22	- 1 15 0.03
11	46 Leonis Minoris	E W	2.5 ...	10 48 ... ...	... ...	48.20 50.00	47.95 49.45	27.473 27.473	40 32 28.25 32 8 38.45	+ 1.62 + 3.31	+ 0.23 - 0.23	+ 4.20 - 4.20	+34 43 18.07
12	<i>d</i> Leonis	W E	3 ...	10 53 4.0 10 58 25.5	2 31.7 2 49.8	49.55 48.25	48.85 47.85	..... .....	1 34 36.55 71 10 4.95	+ 2.05 + 0.84	+17.06 -21.38	- 39.74 + 39.76	+ 4 7 12.43
13	<i>n</i> Leonis	E W	2.5 ...	11 8 20.3 11 13 23.5	2 29.9 2 33.3	48.50 50.30	47.85 49.70	..... .....	61 28 21.32 11 16 11.68	+ 0.99 + 2.85	-21.82 +22.82	+ 26.83 - 26.84	+13 49 8.15
14	83 Leonis	W E	2.5 3	11 19 6.5 11 26 7.0	2 46.7 4 13.8	49.05 48.00	48.30 47.35	..... .....	0 58 45.68 71 46 17.85	+ 1.52 + 0.47	+20.32 -47.10	- 40.68 + 40.70	+ 3 31 24.01
15	<i>o</i> Hydræ	E W	4 ...	11 32 47.0 11 38 24.0	2 39.5 2 57.5	47.90 49.60	47.10 48.90	..... .....	109 28 16.35 323 16 16.60	+ 0.30 + 2.09	- 9.33 +11.55	+3 6.37 -3 6.42	-34 13 38.39
16	Groombridge 1830	W E	2.5 ...	11 48 ... ...	... ...	49.35 47.50	48.55 46.85	23.617 23.617	35 51 29.78 36 54 55.15	+ 1.55 - 0.59	- 0.04 + 0.17	- 0.53 + 0.53	+38 23 34.30
17	<i>o</i> Virginis	E W	3 ...	11 57 51.5 12 3 11.0	2 27.3 2 52.2	47.50 49.40	46.95 48.70	..... .....	66 2 8.68 6 42 21.00	+ 0.01 + 1.89	-18.36 +25.09	+ 32.67 - 32.67	+ 9 15 12.71
18	2 Canum Venat.	W E	... ...	12 11 ... ...	... ...	49.00 47.70	48.25 47.05	24.094 24.094	38 38 34.58 34 7 9.95	+ 0.88 - 0.38	- 0.19 + 0.19	+ 2.27 - 2.27	+41 11 1.57
19	323 G. Hydræ	E W	4 ...	12 19 10.0 12 24 30.0	2 38.4 2 41.6	47.60 49.65	47.00 48.80	..... .....	107 33 40.92 325 10 55.12	+ 0.15 + 2.09	- 9.50 + 9.89	+2 46.82 -2 46.82	-32 18 42.51
20	<i>f</i> Virginis	W E	3 ...	12 29 16.0 12 34 46.0	2 34.5 2 55.5	48.90 47.50	48.05 46.80	..... .....	352 8 45.32 80 35 56.10	+ 1.31 - 0.08	+14.46 -18.66	- 55.81 + 55.80	- 5 18 57.39

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
19 10 32	66.9	...	...	1. 11. Instrument in meridian, observation at I with movable thread.					1	36 22 19.48	...
10 41	66.3	...	...	16 Instrument in meridian, W. observation at VII; E. observation at VIII with movable thread.					2	18.56	...
10 56	65.7	...	...	18. Instrument in meridian, observation at VIII with movable thread.					3	18.68	...
11 11	64.9	66.9	29.876						4	18.35	+ 6.02
24 9 21	54.3	55.7	29.606						5	19.48	+13.24
9 36	53.6	...	...						6	19.96	...
9 47	53.0	...	...						7	19.29	...
10 0	52.6	54.0	29.602						8	19.62	...
10 25	51.9	...	...						9	19.67	...
10 37	51.5	...	...						10	20.02	...
10 46	51.2	53.3	29.599						11	20.28	...
10 55	50.9	...	...						12	20.04	...
11 11	50.3	...	...	Notes.					13	18.92	+ 5.48
11 22	50.4	...	...	7. Faint; late.					14	19.38	...
11 35	50.1	51.4	29.596	14. Late.					15	18.76	+14.62
11 46	49.9	...	...	19. Poor; faint.					16	20.01	...
12 0	49.7	...	...						17	19.16	...
12 14	49.6	...	...						18	18.98	...
12 22	49.6	...	...						19	19.34	+11.39
12 32	49.6	50.8	29.593						20	19.22	...

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
	April 28, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	28 Hydræ	W	3	9 18 1.0	2 34.1	47.75	46.95	.....	352 44 46.58	- 0.07	+14.55	- 53.14	- 4 42 55.73
		E	...	9 23 30.0	2 54.9	49.55	48.90	.....	79 59 56.25	+ 1.80	-18.75	+ 53.19	
2	κ Hydræ	E	3	9 33 9.0	2 32.1	48.80	49.40	.....	89 11 8.25	+ 1.73	-11.96	+1 13.60	-13 54 34.69
		W	...	9 38 27.0	2 45.9	50.05	50.80	.....	343 33 25.48	+ 3.10	+14.22	-1 13.66	
3	6 Sextantis	W	3	9 43 36.0	2 47.0	49.90	50.45	.....	353 39 14.85	+ 2.84	+17.41	- 51.69	- 3 48 21.07
		E	...	9 49 2.0	2 39.0	49.00	49.30	.....	79 5 20.92	+ 1.79	-15.78	+ 51.72	
4	ν ² Hydræ	E	3	9 57 46.5	2 39.7	48.80	49.15	.....	87 53 22.58	+ 1.62	-13.49	+1 10.48	-12 36 44.39
		W	...	10 3 23.0	2 56.8	51.00	51.25	.....	344 51 9.50	+ 3.81	+16.53	-1 10.52	
5	29 Sextantis	W	3	10 21 53.0	2 42.7	49.65	49.65	.....	355 11 55.18	+ 2.34	+17.05	- 49.11	- 2 15 38.79
		E	...	10 27 27.0	2 51.3	50.25	50.30	.....	77 32 42.98	+ 2.91	-18.89	+ 49.15	
6	33 Sextantis	E	3	10 34 3.0	2 27.7	49.80	49.65	.....	76 32 1.80	+ 2.30	-14.35	+ 47.44	- 1 15 0.04
		W	...	10 39 23.0	2 52.3	50.75	50.70	.....	356 12 28.58	+ 3.36	+19.52	- 47.45	
7	46 Leonis Minoris	W	3	10 48 ....	.....	50.65	50.70	27.500	32 8 39.38	+ 2.58	- 0.23	- 4.13	+34 43 19.05
		E	...	.....	.....	49.60	49.45	27.500	40 32 26.85	+ 1.40	+ 0.23	+ 4.13	
8	γ Leonis	E	3	10 57 19.0	2 44.6	49.45	49.25	.....	67 26 49.55	+ 1.97	-22.06	+ 33.94	+ 7 50 32.81
		W	...	11 2 46.0	2 42.4	50.55	50.40	.....	5 17 45.22	+ 3.18	+21.48	- 33.95	
9	237 B. Ursæ Majoris	W	3	11 8 42.0	2 35.8	49.90	49.85	.....	47 26 50.05	+ 2.50	-34.48	+ 11.04	+49 59 26.19
		E	...	11 14 23.0	3 5.2	48.70	48.80	.....	25 17 30.78	+ 1.40	+48.70	- 11.05	
10	83 Leonis	E	3	11 19 9.0	2 44.4	48.75	48.75	.....	71 45 51.18	+ 1.41	-19.76	+ 40.08	+ 3 31 24.32
		W	...	11 24 45.0	2 51.6	50.30	49.95	.....	0 58 44.25	+ 2.76	+21.53	- 40.09	
11	o Hydræ	W	4	11 32 53.0	2 33.7	49.75	49.75	.....	323 16 17.72	+ 2.34	+ 8.66	-3 3.71	-34 13 38.36
		E	...	11 38 30.0	3 3.3	49.15	49.00	.....	109 28 21.72	+ 1.66	-12.32	+3 3.77	
12	2 Canum Venat.	E	3	12 11 ....	.....	48.75	48.35	24.087	34 7 9.48	+ 1.90	+ 0.29	- 2.24	+41 11 1.86
		W	...	.....	.....	50.60	50.50	24.087	38 38 34.18	+ 3.92	- 0.29	+ 2.24	
13	323 G. Hydræ	W	3.5	12 19 11.0	2 37.6	49.80	49.50	.....	325 10 54.10	+ 2.29	+ 9.41	-2 44.63	-32 18 42.53
		E	...	12 24 36.0	2 47.4	49.05	48.75	.....	107 33 43.68	+ 1.57	-10.61	+2 44.68	
14	f Virginis	E	3	12 29 14.0	2 36.7	48.90	48.55	.....	80 35 52.92	+ 1.40	-14.87	+ 55.08	- 5 18 57.47
		W	...	12 34 47.0	2 56.3	50.25	50.30	.....	352 8 39.82	+ 2.91	+18.82	- 55.06	
	May 2, L.												
15	30 H. Camelop.	E	3.5	10 17 32.0	2 3.1	48.90	50.20	.....	352 15 59.92	+ 1.07	+ 1.12	- 52.78	+83 2 25.97
		W	...	10 22 46.0	3 10.9	48.85	50.00	.....	80 28 37.20	+ 0.87	- 2.69	+ 52.80	
16	39 Ursæ Majoris	W	3	10 35 9.0	2 33.1	48.30	49.50	.....	55 8 41.35	+ 0.35	-16.52	+ 18.54	+57 41 41.91
		E	...	10 40 32.0	2 49.7	48.80	50.10	.....	17 35 50.30	+ 0.97	+20.29	- 18.55	
17	54 Leonis	E	3	10 48 12.0	2 13.1	48.70	49.75	.....	50 2 47.18	+ 0.60	-28.76	+ 13.29	+25 15 3.39
		W	...	10 53 16.5	2 51.4	48.75	49.85	.....	22 41 30.90	+ 0.80	+47.68	- 13.30	
18	γ Leonis	W	3	10 57 34.0	2 29.9	48.30	49.65	.....	5 17 49.30	+ 0.48	+18.30	- 32.92	+ 7 50 32.65
		E	...	11 2 39.0	2 35.1	49.05	50.40	.....	67 26 48.42	+ 1.19	-19.59	+ 32.93	
19	237 B. Ursæ Majoris	E	3	11 8 47.0	2 31.0	48.80	50.00	.....	25 17 46.15	+ 0.91	+32.39	- 10.70	+49 59 26.99
		W	...	11 14 1.0	2 43.0	49.60	50.70	.....	47 26 55.02	+ 1.64	-37.74	+ 10.70	
20	83 Leonis	W	3	11 19 8.5	2 45.2	49.20	50.40	.....	0 58 45.18	+ 1.27	+19.95	- 38.82	+ 3 31 24.42
		E	...	11 24 30.0	2 36.3	49.05	50.30	.....	71 45 49.68	+ 1.20	-17.86	+ 38.82	

Time.	Ther. 1892.	Att. ther	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>				<i>° ' "</i>	<i>"</i>
28 9 21	66.2	69.3	29.791	7	Instrument in meridian, observation at IX with movable thread.	1	36 22 20.20	+13.21
9 36	65.1			12	Instrument in meridian, observation at I with movable thread.	2	20 08	
9 47	64.2					3	21 01	
10 0	63.6					4	26 26	
10 8		65.1	29.796			5	26 80	
10 25	61.9					6	26 60	
10 37	62.0					7	20.66	
10 45	62.6					8	19.66	
11 0	61.9	64.0	29.812			9	19 47	- 5.04
11 17	61.3					10	20.68	
11 22	61.3					11	19.92	+15.19
11 36	60.6					12	20.91	
11 55	60.6	62.5	29.826			13	20.24	+11.97
12 0	60.6					14	20.51	
12 22	59.7					15	18.26	-11.25
12 32	60.1	61.6	29.842			16	18.06	- 7.97
12 50	72.9	74.7	29.474			17	19.24	+ 1.66
13 18	72.5					18	19.66	
13 51	71.6					19	19.18	- 5.71
14 0	71.5	73.1	29.468			20	19.71	
14 12	71.7							
					Note			
					16. Faint; clouds.			

Note
16. Faint; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	u Leonis	E W	3 ...	11 29 10.0 11 34 38.5	2 43.1 2 36.4	48.70 49.65	50.05 50.95	..... .....	75 35 33.75 357 9 3.58	+ 0.88 + 1.80	-17.85 +16.41	+ 44.59 - 44.59	- 0 18 25.53
2	Groombridge 1830	E W	2.5 ...	11 48 ..... .....	..... .....	49.10 49.50	50.35 50.65	23.364 23.364	36 55 1.82 35 51 40.10	+ 1.78 + 2.18	+ 0.17 - 0.17	+ 0.50 - 0.50	+38 23 35.22
3	o Virginis	W E	3.5 ...	11 57 35.0 12 3 10.0	2 44.3 2 50.7	48.75 49.20	49.90 50.40	..... .....	6 42 24.30 66 2 15.18	+ 0.76 + 1.24	+22.84 -24.65	- 31.15 + 31.17	+ 9 15 13.45
4	14 Comæ Berenices	E W	3 ...	12 19 10.0 12 24 28.5	2 26.1 2 52.4	49.00 49.75	50.05 50.75	..... .....	47 30 44.60 25 13 33.10	+ 0.99 + 1.77	-41.49 +57.74	+ 10.80 - 10.81	+27 47 20.00
5	χ Virginis	W E	3.5 ...	12 31 35.0 12 37 22.0	2 42.9 3 4.1	48.90 49.30	50.00 50.65	..... .....	349 58 55.05 82 45 45.80	+ 0.92 + 1.50	+15.42 -19.69	- 57.53 + 57.57	- 7 28 49.11
6	May 4. L. H. Camelop.	W E	2 ...	10 17 36.0 10 22 6.0	1 58.9 2 31.1	49.40 49.45	50.35 50.50	..... .....	80 28 35.55 352 15 59.35	+ 1.52 + 1.73	- 1.04 + 1.69	+ 53.33 - 53.35	+83 2 26.52
7	39 Ursæ Majoris	E W	2.5 ...	10 35 8.0 10 40 25.0	2 33.0 2 44.0	48.95 49.75	49.85 50.85	..... .....	17 35 54.60 55 8 43.88	+ 1.13 + 1.96	+16.49 -18.95	- 18.75 + 18.77	+57 41 42.65
8	54 Leonis	W E	2.5 2	10 47 52.5 10 53 14.3	2 32.7 2 49.1	49.50 49.05	50.50 50.00	..... .....	22 41 39.80 50 3 5.48	+ 1.72 + 1.20	+37.85 -46.41	- 13.44 + 13.45	+25 15 2.65
9	ψ Ursæ Majoris	E W	2.5 ...	11 4 ..... .....	..... .....	49.05 49.85	49.95 50.80	27.287 27.287	30 15 28.40 42 25 53.38	+ 1.78 + 2.66	+ 0.22 - 0.22	- 5.90 + 5.90	+45 0 35.16
10	δ Crateris	W E	3 ...	11 11 45.0 11 17 10.0	2 47.5 2 37.5	49.55 48.95	50.60 49.90	..... .....	343 11 38.85 89 32 57.62	+ 1.80 + 1.10	+14.41 -12.74	-1 13.74 +1 13.76	-14 16 22.66
11	u Leonis	W E	3 ...	11 29 12.0 11 34 34.0	2 50.2 2 31.8	49.65 49.00	50.75 50.05	..... .....	357 9 1.75 75 35 30.30	+ 1.88 + 1.22	+19.44 -15.46	- 45.15 + 45.16	- 0 18 25.10
12	298 G. Hydræ	E W	3 ...	11 41 19.0 11 46 51.0	2 35.5 2 56.5	48.80 50.15	49.45 50.95	..... .....	101 29 35.52 331 14 56.50	+ 0.83 + 2.23	-10.14 +13.06	+1 58.85 -1 58.91	-26 13 49.54
13	o Virginis	E W	2.5 ...	11 57 41.0 12 3 8.5	2 38.4 2 49.1	48.65 50.30	49.25 51.10	..... .....	66 2 11.98 6 42 22.55	+ 0.55 + 2.36	-21.23 +24.19	+ 31.59 - 31.60	+ 9 15 13.85
14	5 B. Ursæ Minoris	W E	3 ...	12 11 30.0 12 16 40.0	2 40.5 2 29.5	50.00 49.00	50.75 49.70	..... .....	84 23 41.52 348 20 55.42	+ 2.10 + 1.01	- 0.78 + 0.68	+1 1.65 -1 1.66	+86 57 41.07
15	20 Comæ Berenices	E W	3 ...	12 22 18.0 12 27 39.5	2 36.1 2 45.4	48.40 50.00	49.20 50.65	..... .....	53 52 52.98 18 51 40.88	+ 0.45 + 2.05	-32.00 +35.92	+ 17.53 - 17.53	+21 24 57.73
16	χ Virginis	W E	3 ...	12 31 44.0 12 37 7.5	2 34.0 2 49.5	49.85 48.70	50.50 49.45	..... .....	349 58 56.92 82 45 43.65	+ 1.86 + 0.79	+13.78 -16.69	- 58.26 + 58.26	- 7 28 49.31
17	31 Comæ Berenices	E W	2.5 ...	12 45 20.0 12 49 10.3	1 41.4 2 8.9	48.55 50.55	49.30 51.30	..... .....	47 14 37.55 25 29 45.42	+ 0.56 + 2.68	-20.42 +32.99	+ 10.68 - 10.68	+28 3 7.57
18	48 Virginis	W E	3 ...	12 56 23.0 13 1 42.0	2 35.1 2 43.9	49.50 48.75	50.30 49.50	..... .....	354 18 3.32 78 26 35.38	+ 1.65 + 0.76	+15.21 -16.99	- 50.15 + 50.19	- 3 9 33.11
19	19 Canum Venat.	E W	2.5 ...	13 11 ..... .....	..... .....	48.80 50.30	49.55 51.10	27.984 27.984	33 54 25.65 38 46 0.35	+ 1.53 + 3.06	+ 0.29 - 0.29	- 2.36 + 2.36	+41 21 6.73
20	α Ursæ Minoris S. P.	W E	2.5 ...	13 18 36.0 13 23 0.0	5 50.1 1 26.1	50.40 48.60	51.30 49.05	..... .....	88 37 36.58 344 6 57.92	+ 2.59 + 0.48	+ 1.37 - 0.08	+1 11.78 -1 11.76	+88 48 10.57

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
2 11 22	71.5	.....	.....	2.9. Instrument in meridian, observation at II with movable thread.	1	36 22 19.28	.....
11 32	71.5	.....	.....	19. Instrument in meridian, observation at I with movable thread.	2	19.61	.....
11 44	71.1	72.6	29.471		3	19.84	.....
12 0	70.9	.....	.....		4	18.35	+ 0.53
12 22	69.8	.....	.....		5	19.52	+ 7.98
12 35	69.2	71.1	29.464		6	19.39	-13.52
4 10 20	68.6	70.7	29.534		7	19.56	- 8.31
10 38	67.8	.....	.....		8	19.82	+ 1.28
10 51	67.5	.....	.....		9	19.97	.....
11 2	66.9	.....	.....		10	20.53	.....
11 15	66.5	68.4	29.534		11	19.57	.....
11 32	66.1	.....	.....		12	18.97	+13.93
11 44	65.6	.....	.....		13	20.20	.....
12 0	65.1	67.2	29.536	Notes.	14	19.97	-11.83
12 14	64.6	.....	.....	3.5. Paint; clouds.	15	20.14	.....
12 25	64.4	.....	.....	16. Hit instrument slightly.	16	20.10	+ 7.93
12 35	64.3	.....	.....		17	19.39	.....
12 48	64.2	65.9	29.538		18	19.68	+ 6.25
12 59	63.7	.....	.....		19	20.62	- 2.29
13 9	63.5	.....	.....		20	19.44	.....

No.	Date, observer, and object.	Circle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoriss. P.	E	2.5	13 27 0.0	2 33.9	48.25	48.95	.....	344 6 58.25	+ 0.25	- 0.27	-1 11.76	+88 48 10.23
		W	...	13 31 40.0	7 13.9	50.40	51.20	.....	88 37 36.50	+ 2.54	+ 2.11	+1 11.76	
2	α Ursæ Minoris	E	4	1 17 50.0	6 36.3	48.80	40.20	.....	346 30 30.78	+ 0.85	+ 1.82	-1 4.21	+88 48 6.93
		W	...	1 23 50.0	0 36.3	48.15	48.55	.....	86 14 5.68	+ 0.17	- 0.02	+1 4.15	
3	α Ursæ Minoris	W	4	1 27 0.0	2 33.7	48.00	48.30	.....	86 14 6.12	- 0.04	- 0.27	+1 4.12	+88 48 7.12
	May 8, L.	E	...	1 32 6.0	7 39.3	48.55	48.95	.....	346 30 29.82	+ 0.60	+ 2.44	-1 4.06	
4	47 Ursæ Majoris	E	3.5	10 54 ....	.....	49.55	40.45	28.057	34 19 27.08	+ 1.90	+ 0.29	- 2.01	+40 56 1.46
		W	...	.....	.....	49.15	49.15	28.057	38 20 53.82	+ 1.51	- 0.29	+ 2.01	
5	φ Ursæ Majoris	W	3	11 4 ....	.....	48.95	49.10	27.413	42 25 53.12	+ 0.12	- 0.22	+ 6.12	+45 0 36.92
		E	...	.....	.....	49.65	49.50	27.413	30 15 23.65	+ 0.66	+ 0.22	- 6.12	
6	δ Crateris	E	4	11 11 49.0	2 43.6	49.40	49.50	.....	89 32 55.92	+ 1.09	-13.75	+1 16.49	-14 16 22.52
		W	3	11 17 20.0	2 47.4	49.10	49.30	.....	343 11 42.85	+ 0.87	+14.39	-1 16.52	
7	e Leonis	W	3.5	11 22 43.0	2 41.9	48.70	48.75	.....	354 58 24.30	+ 0.32	+16.80	- 50.57	- 2 29 12.76
		E	...	11 28 12.5	2 47.6	49.90	49.80	.....	77 46 15.45	+ 1.47	-18.01	+ 50.58	
8	208 G. Hydræ	W	4	11 41 22.0	2 32.6	49.15	49.05	.....	331 15 6.42	+ 0.74	+ 9.77	-2 3.24	-26 13 49.56
		E	...	11 46 48.0	2 53.4	49.70	49.85	.....	101 29 33.82	+ 1.45	-12.61	+2 3.28	
9	b Virginis	E	3.5	11 52 21.0	2 41.3	49.40	49.15	.....	71 6 37.12	+ 0.90	-19.32	+ 39.85	+ 4 10 37.70
		W	...	11 57 44.0	2 41.7	49.50	49.30	.....	1 38 0.28	+ 1.09	+19.42	- 39.85	
10	10 Virginis	W	3	12 2 4.0	2 42.6	49.40	49.05	.....	359 52 53.92	+ 0.86	+18.85	- 42.50	+ 2 25 26.56
		E	...	12 7 26.0	2 39.4	49.55	49.35	.....	72 51 45.62	+ 1.13	-18.11	+ 42.50	
11	5 B. Ursæ Minoris	E	3.5	12 11 28.0	2 41.5	49.50	49.20	.....	348 20 57.50	+ 0.99	+ 0.79	-1 3.83	+86 57 41.78
		W	...	12 16 26.0	2 16.5	50.00	49.85	.....	84 23 41.02	+ 1.61	- 0.56	+1 3.83	
12	20 Comæ Berenices	W	3	12 22 19.0	2 35.3	49.60	49.50	.....	18 51 47.80	+ 1.23	+31.67	- 18.13	+21 24 58.42
		E	...	12 27 38.3	2 44.0	49.95	49.60	.....	53 52 54.60	+ 1.43	-35.32	+ 18.13	
13	γ Virginis	E	3	12 31 38.5	2 39.6	49.40	49.05	.....	82 45 39.65	+ 0.90	-14.80	+1 0.24	- 7 28 49.33
		W	...	12 37 3.0	2 44.9	50.10	49.85	.....	349 58 57.02	+ 1.03	+15.80	-1 0.24	
14	31 Comæ Berenices	W	3	12 44 41.0	2 20.6	49.60	49.25	.....	25 29 42.15	+ 1.10	+39.25	- 11.04	+28 3 7.76
		E	...	12 49 39.5	2 37.9	49.95	49.55	.....	47 15 6.08	+ 1.41	-49.49	+ 11.05	
15	48 Virginis	E	4	12 56 20.0	2 38.3	49.40	49.20	.....	78 26 32.18	+ 0.92	-15.85	+ 51.83	- 3 9 32.39
		W	...	13 1 41.0	2 42.7	50.15	50.05	.....	354 18 4.55	+ 1.71	+16.74	- 51.82	
16	19 Canum Venat.	W	3	13 11 ....	.....	49.85	49.55	27.960	38 46 4.65	+ 0.72	- 0.19	+ 2.44	+41 21 8.16
		E	...	.....	.....	49.80	49.50	27.960	33 54 25.98	+ 0.70	+ 0.19	- 2.44	
17	i Virginis	E	3	13 19 1.0	2 38.8	49.35	49.25	.....	87 20 50.50	+ 0.97	-13.43	+1 11.10	-12 13 12.95
		W	...	13 24 16.0	2 36.2	50.15	49.65	.....	345 14 46.85	+ 1.55	+13.00	-1 11.10	
18	81 Ursæ Majoris	W	3	13 28 24.0	2 1.5	50.10	49.65	.....	53 16 40.15	+ 1.53	-12.10	+ 17.47	+55 49 53.26
	May 12, L.	E	...	13 33 11.5	2 46.0	49.45	49.35	.....	19 27 36.48	+ 1.07	+22.57	- 17.47	
19	47 Ursæ Majoris	W	3	10 54 ....	.....	44.00	47.70	28.103	38 20 52.32	- 0.31	- 0.19	+ 1.96	+40 56 1.36
		E	...	.....	.....	45.45	49.40	28.103	34 19 24.62	+ 1.33	+ 0.19	- 1.96	
20	θ Leonis	E	2.5	11 6 33.5	2 39.0	49.05	49.05	.....	59 21 4.32	+ 1.76	-26.42	+ 23.64	+15 56 33.52
		W	...	11 12 8.5	2 56.0	48.15	47.90	.....	13 23 27.75	+ 0.74	+32.37	- 23.65	

Time.	Ther. 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	
4 11 11	51.6	65.2	29.830	4	Instrument in meridian, observation at I with movable thread.				1	46 22 19.69
1 15	56.8	76.0	29.814	5, 16, 19	Instrument in meridian, observation at VIII with movable thread.				2	19.61
1 24	72.0	.....	.....						3	19.16
1 33	72.9	76.9	29.811						4	20.46
1 40-52	66.6	57.2	29.802						5	20.28
1 15	64.1	.....	.....						6	20.67
1 26	64.2	.....	.....						7	20.17
1 44	61.6	55.7	29.804						8	19.82
1 55	61.1	.....	.....						9	19.74
1 5	53.2	.....	.....						10	21.14
1 14	51.2	.....	.....						11	20.68
1 25	61.5	.....	.....						12	20.50
1 35	61.5	54.8	29.821						13	20.10
1 47	61.1	.....	.....						14	20.26
1 59	61.1	.....	.....						15	20.11
1 22	61.1	.....	.....						16	20.18
1 31	60.2	54.4	29.816						17	19.72
1 50-53	59.2	72.1	29.800						18	19.15
1 9	56.1	.....	.....						19	19.17
									20	20.26

Note.
Very faint, clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>r</i> Crateris	W E	3.5 ...	11 17 25.0 11 22 50.0	2 40.4 2 44.6	47.75 49.05	47.55 49.10	..... .....	340 17 57.45 92 26 40.98	+ 0.37 + 1.77	+12.57 -13.24	-1 22.73 +1 22.74	-17 10 15.74
2	<i>ζ</i> Crateris	E W	4 ...	11 37 13.0 11 42 43.0	2 41.3 2 48.7	49.15 48.05	49.00 47.90	..... .....	93 6 13.92 339 38 20.30	+ 1.75 + 0.64	-12.57 +13.75	+1 24.88 -1 24.89	-17 49 52.53
3	<i>o</i> Leonis	W E	3 ...	11 48 19.0 11 53 34.0	2 25.8 2 49.2	47.50 49.45	47.30 49.15	..... .....	13 37 14.38 59 7 31.72	+ 0.09 + 2.04	+22.40 -30.16	- 23.41 + 23.42	+16 10 9.78
4	<i>10</i> Virginis	E W	3 ...	12 2 10.0 12 7 22.5	2 36.7 2 35.8	49.25 48.55	48.85 48.25	..... .....	72 51 45.10 359 52 53.92	+ 1.79 + 1.09	-17.51 +17.31	+ 41.30 - 41.31	+ 2 25 26.72
5	<i>c</i> Virginis	W E	3.5 3	12 12 51.0 12 18 27.5	2 37.9 2 58.6	48.35 49.45	48.30 49.10	..... .....	1 17 28.45 71 27 13.98	+ 1.04 + 2.01	+18.37 -23.50	- 39.23 + 39.23	+ 3 50 5.02
6	<i>8</i> Canum Venat.	E W	3 ...	12 29 ..... .....	..... .....	49.45 48.65	48.95 48.45	27.752	33 23 32.10 39 19 10.65	+ 2.52 + 1.84	+ 0.19 - 0.19	- 2.88 + 2.88	+41 52 10.16
7	<i>330</i> G. Hydræ	W E	4 ...	12 36 10.0 12 41 36.0	2 44.7 2 41.3	47.55 49.45	47.50 49.15	..... .....	329 40 20.98 103 4 15.82	+ 0.18 + 1.98	+11.08 -10.63	-2 9.04 +2 9.09	-27 48 39.97
8	<i>φ</i> Virginis	E W	3.5 ...	12 46 39.0 12 52 8.0	2 43.5 2 45.5	49.30 48.40	49.05 48.05	..... .....	84 18 37.40 348 25 58.88	+ 1.87 + 0.97	-15.09 +15.46	+1 1.97 -1 1.99	- 9 1 49.86
9	<i>14</i> Canum Venat.	W E	3 ...	13 1 ..... .....	..... .....	47.85 49.50	47.70 49.30	24.507 24.507	33 45 33.72 38 59 40.88	- 0.10 + 1.57	- 0.16 + 0.16	- 2.56 + 2.56	+36 18 9.42
10	<i>r</i> Centauri	E W	4 ...	13 9 10.0 13 14 44.0	2 24.8 3 9.2	49.15 48.35	48.90 48.10	..... .....	106 15 50.70 326 28 37.92	+ 1.78 + 0.90	- 8.12 +13.86	+2 31.75 -2 31.82	-31 0 41.06
11	<i>i</i> Virginis	W E	3.5 ...	13 19 51.0 13 24 26.0	1 48.9 2 46.1	47.95 49.60	47.55 49.40	..... .....	345 14 53.82 87 29 51.60	+ 0.42 + 2.27	+ 6.32 -14.70	-1 9.46 +1 9.50	-12 13 12.22
12	<i>81</i> Ursæ Majoris	E W	3 ...	13 28 32.0 13 33 4.0	1 53.6 2 38.4	49.30 48.90	49.10 48.40	..... .....	19 27 45.45 53 17 0.08	+ 1.95 + 1.36	+10.57 -20.55	- 17.07 + 17.07	+55 49 55.09
13	<i>May 16, L.</i> <i>θ</i> Leonis	W E	3 ...	11 6 30.5 11 12 8.5	2 42.2 2 55.8	48.95 48.70	48.95 48.85	..... .....	13 23 32.48 59 21 11.42	+ 0.93 + 0.73	+27.49 -32.30	- 23.48 + 23.50	+15 56 33.61
14	<i>r</i> Crateris	E W	3 ...	11 17 24.0 11 22 46.0	2 41.6 2 40.4	48.60 49.30	48.90 49.80	..... .....	92 26 41.40 340 17 54.20	+ 0.68 + 1.56	-12.76 +12.57	+1 22.18 -1 22.22	-17 10 16.13
15	<i>ζ</i> Crateris	W E	3.5 ...	11 37 15.0 11 42 47.0	2 39.4 2 52.6	48.30 48.85	48.65 49.30	..... .....	339 38 21.00 93 6 17.02	+ 0.38 + 0.99	+12.27 -14.39	-1 24.36 +1 24.40	-17 49 52.79
16	<i>o</i> Leonis	E W	2.5 ...	11 48 4.5 11 53 29.0	2 40.5 2 44.0	48.70 49.25	48.95 49.50	..... .....	59 7 28.82 13 37 5.75	+ 0.80 + 1.34	-27.15 +28.34	+ 23.30 - 23.31	+16 10 9.75
17	<i>c</i> Virginis	E W	3 ...	12 12 34.0 12 18 4.5	2 55.1 2 35.4	48.50 49.30	49.00 49.60	..... .....	71 27 13.72 1 17 26.38	+ 0.71 + 1.44	-22.58 +17.79	+ 39.02 - 39.04	+ 3 50 4.42
18	<i>8</i> Canum Venat.	W E	2.5 ...	12 29 ..... .....	..... .....	49.00 48.65	49.30 49.00	..... .....	39 19 11.88 33 25 27.88	+ 0.53 + 0.22	- 0.19 + 0.19	+ 2.87 - 2.87	+41 52 11.41
19	<i>330</i> G. Hydræ	E W	4 ...	12 36 16.0 12 41 43.0	2 38.8 2 48.2	48.55 49.20	48.95 49.40	..... .....	103 4 17.85 329 40 17.92	+ 0.66 + 1.23	-10.30 +11.56	+2 8.56 -2 8.62	-27 48 40.77
20	<i>φ</i> Virginis	W E	3 ...	12 46 46.0 12 52 9.0	2 36.7 2 46.3	48.85 48.75	49.10 48.90	..... .....	348 26 0.55 84 18 38.42	+ 0.98 + 0.75	+13.86 -15.61	-1 1.70 +1 1.72	- 9 1 49.23

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
12 11 20	70.0	.....	.....	6. Instrument in meridian; E. observation at II with movable thread; W. observation assumed as at II with fixed thread.	1	36 22 19.96	+13.29
11 40	69.5	.....	.....		2	18.89	.....
11 51	69.8	.....	.....	9. Instrument in meridian, observation at VIII with movable thread.	3	20.24	+ 2.60
12 5	69.2	70.7	29.992	18. Instrument in meridian, observation at VIII between fixed thread and movable at 24.867 rev.	4	20.84	+ 6.29
12 15	69.1	.....	.....		5	20.18	+ 5.62
12 27	69.1	.....	.....		6	21.58	.....
12 39	68.8	.....	.....		7	19.73	+11.70
12 50	68.2	69.7	29.996		8	19.74	+ 7.60
13 12	67.8	.....	.....		9	21.58	- 3.06
13 22	67.3	.....	.....		10	18.48	+10.17
13 31	67.1	68.6	29.998		11	19.88	+ 6.79
16 11 10	73.5	75.2	29.983		12	19.43	- 6.40
11 20	73.1	.....	.....		13	20.38	.....
11 40	72.5	.....	.....	Note.	14	18.80	+13.25
11 52	72.0	.....	.....	4 E, 16 W. One microscope reading decreased 10".	15	18.66	.....
12 15	71.8	73.3	29.990		16	18.94	+ 2.18
12 39	70.5	.....	.....		17	18.72	+ 5.34
12 50	70.1	.....	.....		18	19.38	.....
					19	19.43	+12.07
					20	19.48	+ 7.55

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	14 Canum Venat.	E W	2.5 ...	13 1 ..... .....	..... .....	48.45 49.20	48.65 49.25	24.457 24.457	38 59 40.50 33 45 33.05	+ 1.25 + 1.94	+ 0.24 - 0.24	+ 2.55 - 2.55	+36 18 10.40
2	7 Centauri	W E	4 ...	13 9 26.0 13 14 42.0	2 9.0 3 7.0	48.10 48.85	48.40 49.05	..... .....	326 28 44.55 106 15 56.90	+ 0.17 + 0.84	+ 6.44 - 13.54	-2 31.09 +2 31.14	-31 0 41.07
3	70 Virginis	E W	2.5 ...	13 21 9.5 13 26 34.5	2 35.3 2 49.7	48.50 49.05	48.65 49.30	..... .....	61 0 45.58 11 43 48.35	+ 0.50 + 1.18	- 23.79 + 28.41	+ 25.61 - 25.62	+14 16 48.78
4	25 Canum Venat.	W E	3 ...	13 33 ..... .....	..... .....	49.00 48.60	49.00 48.65	..... .....	34 13 28.40 38 31 4.25	+ 0.40 - 0.01	- 0.16 + 0.16	- 2.10 + 2.10	+36 46 26.59
5	May 18, L. e Leonis	E W	3 ...	11 22 38.5 11 28 4.0	2 48.5 2 37.0	48.20 49.85	48.70 50.40	..... .....	77 46 18.40 354 58 20.52	+ 1.32 + 3.03	- 18.20 + 15.80	+ 47.64 - 47.64	- 2 29 12.15
6	1 Canum Venat.	W E	3 ...	12 10 0.0 12 14 15.0	0 1.2 4 16.2	47.40 48.45	47.75 49.00	..... .....	51 24 25.45 21 19 10.42	+ 0.43 + 1.64	0.00 + 3.08	+ 14.58 - 14.61	+53 57 36.53
7	24 Comæ Berenices	W E	3 ...	12 28 36.0 12 33 12.0	1 43.6 2 52.4	47.95 48.50	48.25 49.00	..... .....	16 20 51.18 56 24 12.22	+ 0.99 + 1.62	+ 12.58 - 34.83	- 19.82 + 19.82	+18 53 39.62
8	p Centauri	E W	4 ...	12 42 46.0 12 48 22.0	2 44.3 2 51.7	47.95 50.10	48.25 50.50	..... .....	108 44 21.55 324 0 15.00	+ 0.97 + 3.21	- 10.02 + 10.94	+2 49.06 -2 49.08	-33 29 24.17
9	σ Virginis	W E	3.5 ...	13 10 7.0 13 16 29.5	2 39.4 3 43.1	48.45 48.45	48.85 48.60	..... .....	3 25 11.02 69 19 47.60	+ 1.56 + 1.47	+ 19.71 - 38.61	- 35.25 + 35.25	+ 5 57 52.23
10	α Ursæ Minoris S. P.	E W	2.5 ...	13 20 10.0 13 24 6.0	4 24.8 0 28.8	47.80 50.30	48.05 50.55	..... .....	344 6 54.95 88 37 43.12	+ 0.81 + 3.41	- 0.79 + 0.01	-1 10.11 +1 10.11	+88 48 7.53
11	α Ursæ Minoris S. P.	W E	3 ...	13 27 15.0 13 31 26.0	2 40.2 6 51.2	50.30 47.80	50.55 47.95	..... .....	88 37 43.42 344 6 55.02	+ 3.41 + 0.76	+ 0.29 - 1.90	+1 10.13 -1 10.16	+88 48 6.67
12	α Ursæ Minoris	E W	3.5 ...	1 19 10.0 1 24 10.0	5 25.2 0 25.2	46.25 51.10	45.95 51.00	..... .....	346 30 31.98 86 13 56.85	+ 0.15 + 5.19	+ 1.22 - 0.01	-1 3.97 +1 3.96	+88 48 4.87
13	α Ursæ Minoris	W E	3.5 ...	1 28 0.0 1 32 0.0	3 24.8 7 24.8	49.20 47.75	49.20 47.90	..... .....	86 13 59.40 346 30 28.40	+ 3.30 + 1.91	- 0.49 + 2.29	+1 3.94 -1 3.94	+88 48 5.31
14	May 21, L. 1 Canum Venat.	E W	2.5 ...	12 7 26.5 12 12 36.0	2 32.3 2 37.2	49.30 51.05	48.90 50.60	..... .....	21 19 51.98 51 24 47.95	+ 0.98 + 2.72	+ 22.32 - 23.77	- 15.15 + 15.17	+53 57 37.55
15	14 Comæ Berenices	W E	2.5 ...	12 19 4.3 12 24 31.5	2 32.4 2 54.8	50.55 49.80	50.05 49.30	..... .....	25 13 53.18 47 31 1.58	+ 2.21 + 1.41	+ 45.14 - 59.36	- 11.13 + 11.14	+27 47 23.90
16	24 Comæ Berenices	E W	2.5 ...	12 28 4.0 12 33 2.0	2 15.6 2 42.4	49.00 50.05	48.40 49.65	..... .....	56 23 57.00 16 20 32.58	+ 0.51 + 1.71	- 21.56 + 30.91	+ 20.63 - 20.64	+18 53 40.57
17	p Centauri	W E	3.5 ...	12 42 50.0 12 48 23.0	2 40.4 2 52.6	49.55 49.40	49.20 48.85	..... .....	324 0 26.00 108 44 15.60	+ 1.21 + 0.96	+ 9.55 - 11.06	-2 56.22 +2 56.31	-33 29 24.06
18	σ Virginis	E W	3 ...	13 10 2.5 13 15 36.5	2 44.0 2 50.0	48.50 50.55	48.00 49.85	..... .....	69 19 29.65 3 25 9.02	+ 0.10 + 2.09	- 20.86 + 22.42	+ 36.78 - 36.70	+ 5 57 52.12
19	α Ursæ Minoris S. P.	W E	2.5 ...	13 19 20.0 13 22 34.0	5 17.1 2 3.1	50.50 49.00	49.65 48.25	..... .....	88 37 40.78 344 6 56.65	+ 1.97 + 0.47	+ 1.13 - 0.17	+1 13.25 -1 13.25	+88 48 6.70
20	α Ursæ Minoris S. P.	E W	2.5 ...	13 26 20.0 13 31 0.0	1 42.9 6 22.9	48.60 50.10	47.70 49.35	..... .....	344 6 57.10 88 37 40.58	- 0.02 + 1.62	- 0.12 + 1.64	-1 13.26 +1 13.26	+88 48 6.72

Time.	Ther- 3802.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>			<i>in.</i>								
16 13 12	69.8			1. Instrument in meridian, observation at I with movable thread					1	36 22 19.88	- 3.81
16 13 24	69.2	70.3	29.986	4. Instrument in meridian, observation at VIII between fixed thread and movable at 25.070 rev					2	17.20	+10.59
16 13 32	69.0								3	20.11	
16 13 39	69.6	69.1	29.701	12.13. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.					4	19.79	
16 13 42	70.1								5	20.44	+ 8.40
16 13 53	70.1								6	20.00	- 8.95
16 14 01	70.1	70.8	29.708						7	21.88	
16 14 06	70.2								8	20.82	+12.78
16 14 14	70.7								9	21.08	+ 3.08
16 14 23	70.3								10	20.76	
16 14 34	70.6	70.4	29.726						11	20.48	
16 14 40	70.8								12	22.08	
16 14 47	71.2								13	22.30	
16 14 50	71.4								14	21.10	- 9.52
16 14 53	71.2								15	22.08	- 2.49
16 14 56	71.8								16	20.57	
16 15 00	72.1								17	21.18	+12.96
16 15 05		69.8	29.992						18	21.20	+ 8.72
16 15 11	69.1								19	20.42	
16 15 23	69.9	69.7	29.991						20	20.40	

Note
9. Clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meri- dian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	May 22, L. α Ursæ Minoris	W E	4 ...	1 19 20.0 1 23 20.0	5 18.3 1 18.3	48.80 49.75	48.35 49.45	..... .....	86 13 59.50 346 30 35.00	+ 0.31 + 1.38	- 1.17 + 0.07	+1 6.31 -1 6.31	+88 48 3.98
2	α Ursæ Minoris	E W	4 ...	1 26 35.0 1 31 20.0	1 56.7 6 41.7	49.60 48.55	49.15 47.95	..... .....	346 30 35.38 86 13 59.36	+ 1.15 - 0.02	+ 0.16 - 1.87	-1 6.33 +1 6.36	+88 48 3.28
3	May 23, L. α Ursæ Minoris S. P.	W E	2.5 ...	13 19 14.0 13 23 16.0	5 24.8 1 22.8	49.85 49.50	49.40 49.25	..... .....	88 37 43.82 344 6 56.00	+ 0.91 + 0.61	+ 1.18 - 0.08	+1 12.90 -1 12.86	+88 48 5.85
4	α Ursæ Minoris S. P.	E W	2.5 ...	13 27 16.0 13 31 50.0	2 37.2 7 11.2	49.50 49.35	49.30 48.90	..... .....	344 6 56.42 88 37 42.82	+ 0.64 + 0.40	- 0.28 + 2.08	-1 12.83 +1 12.78	+88 48 6.36
5	α Ursæ Minoris	W E	4 ...	1 18 50.0 1 23 20.0	5 49.3 1 19.3	48.20 48.35	48.95 48.95	..... .....	86 13 59.70 346 30 35.45	+ 0.75 + 0.85	- 1.41 + 0.07	+1 5.78 -1 5.75	+88 48 3.68
6	α Ursæ Minoris	E W	4 ...	1 27 30.0 1 31 46.0	2 50.7 7 6.7	48.25 47.60	48.95 48.35	..... .....	346 30 36.50 86 14 0.90	+ 0.80 + 0.13	+ 0.34 - 2.11	-1 5.72 +1 5.70	+88 48 2.93
7	May 24, L. 1 Canum Venat.	W E	2 ...	12 7 28.0 12 12 38.5	2 30.9 2 39.6	47.25 48.15	49.35 50.30	..... .....	51 24 50.28 21 19 50.32	+ 0.66 + 1.66	-21.90 +24.50	+ 14.88 - 14.90	+53 57 37.75
8	33 H ¹ . Virginis	E W	2.5 ...	12 20 24.0 12 25 42.0	2 33.1 2 44.9	48.15 48.40	50.35 50.50	..... .....	79 22 49.60 353 21 51.22	+ 1.63 + 1.89	-14.54 +16.87	+ 51.67 - 51.69	- 4 5 48.46
9	9 Canum Venat.	W E	2 ...	12 34 ..... .....	..... .....	48.25 48.55	49.75 50.15	25.208 25.208	38 50 28.60 33 53 50.85	+ 0.78 + 1.22	- 0.19 + 0.19	+ 2.40 - 2.40	+41 23 37.44
10	35 Virginis	E W	2.5 ...	12 40 19.5 12 45 42.5	2 39.7 2 43.3	48.40 48.55	49.80 50.10	..... .....	71 12 12.65 1 32 30.70	+ 1.44 + 1.69	-18.90 +19.76	+ 38.63 - 38.65	+ 4 5 6.42
11	σ Virginis	W E	3 ...	13 10 3.0 13 15 32.5	2 43.5 2 46.0	48.05 48.55	49.60 49.75	..... .....	3 25 14.10 69 19 31.10	+ 1.22 + 1.58	+20.74 -21.37	- 36.08 + 36.09	+ 5 57 52.87
12	70 Virginis	W E	2.5 ...	13 21 10.0 13 26 28.5	2 35.0 2 43.5	48.70 48.70	50.25 50.10	..... .....	11 43 57.12 61 0 49.62	+ 1.94 + 1.79	+23.70 -26.37	- 25.56 + 25.57	+14 16 49.88
13	25 Canum Venat.	E W	2.5 ...	13 33 ..... .....	..... .....	48.50 49.75	49.95 51.10	..... .....	38 31 6.30 34 13 32.70	+ 2.21 + 3.47	+ 0.16 - 0.16	+ 2.09 - 2.09	+36 46 28.16
14	89 Virginis	W E	3 ...	13 42 6.0 13 47 35.0	2 35.1 2 53.9	48.55 48.80	50.00 50.20	..... .....	339 48 13.95 92 56 31.72	+ 1.62 + 1.87	+11.65 -14.65	-1 24.41 +1 24.45	-17 40 3.71
15	47 Hydræ	E W	3.5 ...	13 52 8.0 13 57 23.0	1 2.1 4 12.9	48.80 49.85	50.30 51.05	..... .....	99 46 42.40 332 57 32.48	+ 1.93 + 2.92	- 1.66 +27.61	+1 51.14 -1 51.20	-24 30 54.42
16	κ Virginis	W E	2.5 ...	14 5 11.0 14 10 34.5	2 37.2 2 46.3	49.25 49.30	50.55 50.55	..... .....	347 37 39.72 85 7 2.95	+ 2.35 + 2.34	+13.74 -15.38	-1 3.71 +1 3.74	- 9 50 14.20
17	3 G. Libræ	E W	3.5 ...	14 16 42.0 14 22 11.0	2 40.3 2 48.7	49.00 50.55	50.00 51.35	..... .....	99 38 49.40 333 5 49.48	+ 1.89 + 3.44	-11.12 +12.31	+1 50.69 -1 50.72	-24 22 51.60
18	56 B. Draconis	W E	3 ...	14 27 4.0 14 31 35.0	2 1.5 2 29.5	50.15 49.00	51.15 49.70	..... .....	58 5 20.38 14 39 16.18	+ 3.10 + 1.77	- 8.30 +12.56	+ 22.31 - 22.31	+60 38 31.22
19	May 25, L. 33 H ¹ . Virginis	W E	2.5 ...	12 20 11.0 12 25 44.0	2 46.1 2 46.9	48.60 48.80	49.60 49.70	..... .....	353 21 51.12 79 22 52.20	+ 0.83 + 0.94	+17.12 -17.28	- 51.37 + 51.39	- 4 5 48.20

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
22 1 20	69.5	.....	.....	1, 2. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.					1	36 22 22.44	.....
1 32	69.0	70.1	30.066	5, 6. Instrument in meridian, observation assumed as between fixed thread and movable at 25.150 rev.					2	21.90	.....
23 13 22	63.2	.....	.....	9. Instrument in meridian, observation at VIII with movable thread.					3	21.24	.....
13 25	.....	66.0	29.966	13. Instrument in meridian, observation at II between fixed thread and movable at 24.933 rev.					4	21.02	.....
13 35	64.0	.....	.....						5	22.62	.....
1 19	71.8	.....	.....						6	23.17	.....
1 27	.....	71.1	29.970						7	22.75	-9.96
1 34	72.6	.....	.....						8	23.12	+6.81
24 12 10	71.8	74.4	29.888						9	22.00	-7.78
12 23	71.3	.....	.....						10	23.60	.....
12 43	70.5	.....	.....						11	23.69	+2.44
12 55	.....	72.3	29.896						12	23.90	.....
13 13	69.2	.....	.....						13	22.81	.....
13 24	68.8	.....	.....						14	23.10	.....
13 45	67.5	70.0	29.899						15	22.81	+7.35
13 55	67.5	.....	.....						16	22.88	.....
14 8	66.9	.....	.....						17	22.68	+5.60
14 20	66.6	.....	.....						18	22.84	-8.49
14 30	66.5	68.4	29.904						19	22.48	+6.79
25 12 23	71.8	73.9	29.746								

Notes.
1. Very faint.
5. Very unsteady.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	9 Canum Venat.	E W	2.5	12 34	.....	48.70 49.45	49.60 50.55	25.147 25.147	33 53 53.58 38 50 28.72	+ 1.62 + 2.41	+ 0.29 - 0.29	- 2.38 + 2.38	+41 23 36.64
2	35 Virginis	W E	2.5	12 40 17.0 12 45 42.0	2 42.2 2 42.8	49.00 48.80	50.05 49.75	..... .....	1 32 30.58 71 12 14.45	+ 1.20 + 0.93	+19.49 -19.64	- 38.41 + 38.42	+ 4 5 5.93
3	17 Canum Venat.	E W	2.5	13 6	.....	48.70 49.95	49.60 51.00	28.046 28.046	36 15 29.98 36 24 55.60	+ 1.45 + 2.78	+ 0.17 - 0.17	- 0.07 + 0.07	+38 59 59.96
4	23 Canum Venat.	W E	2	13 16	.....	49.85 48.55	50.75 49.50	25.284 25.284	38 5 32.85 34 38 41.78	+ 1.32 - 0.03	- 0.29 + 0.29	+ 1.67 - 1.67	+40 38 44.17
5	69 H. Ursæ Majoris	E W	2.5	13 22 28.0 13 27 50.0	2 27.5 2 54.5	48.50 50.20	49.10 50.65	..... .....	14 51 46.25 57 53 1.78	+ 0.53 + 2.15	+12.42 -17.38	- 21.83 + 21.84	+60 26 2.09
6	m Virginis	W E	3	13 34 6.0 13 39 0.0	2 29.9 2 24.1	49.65 48.45	50.35 49.00	..... .....	349 14 3.20 83 30 39.65	+ 1.76 + 0.39	+12.87 -11.89	- 59.66 + 59.69	- 8 13 48.26
7	89 Virginis	E W	3	13 42 25.0 13 47 30.0	2 16.1 2 48.9	48.45 50.05	49.05 50.80	..... .....	92 56 27.62 339 48 9.32	+ 0.40 + 2.11	- 8.97 +13.82	+1 23.81 -1 23.83	-17 40 4.14
8	47 Hydræ	W E	3.5	13 52 22.0 13 57 19.0	0 48.1 4 8.9	49.60 48.80	50.30 49.35	..... .....	332 57 57.72 99 47 9.45	+ 1.72 + 0.78	+ 1.00 -26.74	-1 50.31 +1 50.36	-24 30 55.28
9	κ Virginis	E W	3	14 5 10.5 14 10 21.0	2 37.7 2 32.8	48.50 50.35	49.10 51.10	..... .....	85 7 3.52 347 37 39.08	+ 0.49 + 2.49	-13.83 +12.98	+1 3.21 -1 3.23	- 9 50 14.46
10	3 G. Libræ	W E	3.5	14 16 46.0 14 22 7.0	2 36.3 2 44.7	50.00 48.85	50.60 49.45	..... .....	333 5 50.55 99 38 52.10	+ 2.06 + 0.83	+10.57 -11.74	-1 49.79 +1 49.83	-24 22 52.24
11	56 B. Draconis	E W	3	14 26 59.0 14 31 48.0	2 6.4 2 42.6	48.35 51.20	49.05 51.90	..... .....	14 39 20.55 58 5 27.45	+ 0.40 + 3.32	+ 8.08 -14.86	- 22.14 + 22.15	+60 38 31.72
12	May 29, L. α Ursæ Minoris S. P.	W E	2	13 18 25.0 13 23 0.0	6 18.7 1 43.7	49.50 50.40	50.05 50.95	..... .....	88 37 44.75 344 6 54.45	+ 0.59 + 1.47	+ 1.61 - 0.12	+1 12.68 -1 12.74	+88 48 5.13
13	α Ursæ Minoris S. P.	E W	2.5	13 27 6.0 13 31 55.0	2 22.3 7 11.3	50.10 49.40	50.65 50.00	..... .....	344 6 54.80 88 37 43.32	+ 1.16 + 0.52	- 0.23 + 2.08	-1 12.80 +1 12.86	+88 48 5.49
14	α Ursæ Minoris	E W	4	1 18 40.0 1 23 16.0	6 4.0 1 28.0	49.20 49.05	49.35 49.35	..... .....	346 30 36.18 86 13 56.85	+ 0.75 + 0.64	+ 1.53 - 0.09	-1 6.91 +1 6.86	+88 48 2.95
15	α Ursæ Minoris	W E	4	1 27 0.0 1 31 20.0	2 16.0 6 36.0	48.85 49.45	49.20 49.25	..... .....	86 13 56.82 346 30 36.72	+ 0.46 + 0.83	- 0.21 + 1.82	+1 6.85 -1 6.86	+88 48 2.29
16	May 30, L. α Ursæ Minoris	W E	4	1 18 30.0 1 22 50.0	6 14.7 1 54.7	47.20 49.15	46.75 48.85	..... .....	86 14 0.55 346 30 37.98	+ 0.07 + 2.18	- 1.63 + 0.15	+1 5.54 -1 5.46	+88 48 1.43
17	α Ursæ Minoris	E W	4.5	1 27 20.0 1 31 35.0	2 35.3 6 50.3	49.15 47.20	49.00 47.40	..... .....	346 30 36.68 86 14 0.00	+ 2.25 + 0.40	+ 0.28 - 1.95	-1 5.37 +1 5.31	+88 48 1.55
18	June 2, L. 17 Canum Venat.	W E	2.5	13 6	.....	48.10 47.85	49.60 49.35	28.217 28.217	36 24 52.75 36 15 21.70	+ 0.97 + 0.72	- 0.27 + 0.27	+ 0.08 - 0.08	+30 0 2.00
19	23 Canum Venat.	E W	2.5	13 16	.....	47.35 47.55	48.85 49.00	25.386 25.386	34 38 35.80 38 5 31.55	+ 1.49 + 1.72	+ 0.19 - 0.19	- 1.66 + 1.66	+40 38 46.06

Time.	Ther- 1882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>								<i>° ' "</i>	<i>"</i>
25 12 43	70.8	.....	.....	1	Instrument in meridian, observation at I with movable thread					1	36 22 22.84	-6.92
13 3	69.9	74.3	29.744	3.19.	Instrument in meridian, observation at II with movable thread.					2	23 51	.....
13 28	69.2	.....	.....	4.18	Instrument in meridian, observation at IX with movable thread.					3	22 56	-6.25
13 32	68.8	.....	.....	14-15.16.17	Instrument in meridian, observation assumed as between fixed thread and movable					4	23 23	-6.59
13 48	68.5	.....	.....		at 25 150 rev					5	22 38	.....
13 55	68.5	70.8	29.748							6	21 00	.....
14 8	68.1	.....	.....							7	22 14	.....
14 19	68.0	.....	.....							8	21 09	-7.41
14 29	67.4	70.7	29.759							9	22 16	.....
29 11 12	69.3	61.1	29.824							10	22 20	-7.26
11 17	69.9	61.1	29.829							11	22 02	-8.74
1 12	61.6	.....	29.928							12	21 14	.....
1 14	61.9	61.9	29.926							13	20 36	.....
30 1 12	71.1	69.9	29.830	Notes						14	20 30	.....
1 14	71.1	71.1	29.828	11 Very faint						15	21 12	.....
2 13 3	74.2	76.7	29.832	14 Very unsteady.						16	24 02	.....
										17	21 20	.....
										18	23 12	-7.62
										19	24 21	-8.04

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P.	W	2.5	13 22 30.0	2 16.8	47.90	49.35	.....	88 37 49.28	+ 1.50	+ 0.21	+1 11.04	+88 48 4.23
		E	3.5	13 26 55.0	2 8.2	47.45	48.90	.....	344 6 53.92	+ 1.02	- 0.18	-1 11.07	
2	<i>m</i> Virginis	E	3	13 34 3.0	2 33.2	47.70	49.35	.....	83 30 41.70	+ 1.36	-13.44	+ 59.27	- 8 13 48.11
		W	...	13 39 18.0	2 41.8	47.95	49.40	.....	349 14 2.18	+ 1.57	+15.00	- 59.28	
3	<i>h</i> Centauri	W	4	13 45 3.0	2 40.7	47.00	48.35	.....	326 1 32.52	+ 0.52	+ 9.92	-2 32.86	-31 27 57.38
		E	...	13 50 12.0	2 28.3	48.05	49.45	.....	106 43 11.98	+ 1.61	- 8.45	+2 32.93	
4	τ Virginis	E	4	13 54 6.0	2 41.3	48.30	49.80	.....	73 17 18.68	+ 1.92	-18.37	+ 41.41	+ 1 59 56.05
	June 4, L.	W	...	13 59 31.0	2 43.7	47.60	49.00	.....	359 27 23.90	+ 1.15	+18.92	- 41.43	
5	61 Virginis	E	3	13 10 47.0	2 37.8	49.30	49.95	.....	93 3 53.60	+ 1.44	-12.03	+1 24.20	-17 47 26.22
		W	...	13 16 20.0	2 55.2	51.50	52.30	.....	339 40 47.25	+ 3.72	+14.84	-1 24.24	
6	69 H. Ursæ Majoris	W	2.5	13 22 14.0	2 41.6	49.85	50.30	.....	57 53 2.05	+ 1.85	-14.91	+ 21.89	+60 26 4.47
		E	...	13 27 45.0	2 49.4	49.15	49.15	.....	14 51 39.70	+ 0.95	+16.38	- 21.89	
7	83 Virginis	W	3	13 36 41.0	2 40.2	51.00	50.75	.....	341 45 41.22	+ 2.71	+12.86	-1 18.04	-15 42 28.34
		E	...	13 41 48.0	2 26.8	48.90	48.55	.....	90 59 0.88	+ 0.49	-10.80	+1 18.07	
8	<i>h</i> Centauri	E	4	13 45 3.0	2 40.8	48.90	48.70	.....	106 43 12.02	+ 0.57	- 9.93	+2 34.33	-31 27 56.98
		W	...	13 50 18.0	2 34.2	51.05	50.90	.....	326 1 32.30	+ 2.81	+ 9.14	-2 34.41	
9	τ Virginis	W	2.5	13 54 8.0	2 39.3	50.50	50.20	.....	359 27 25.32	+ 2.16	+17.91	- 41.79	+ 1 59 56.76
		E	...	13 59 28.5	2 41.2	48.65	48.45	.....	73 17 19.48	+ 0.32	-18.34	+ 41.81	
10	ϵ Virginis	E	2.5	14 8 15.0	2 45.8	50.30	49.60	.....	80 50 9.98	+ 1.70	-16.57	+ 54.63	- 5 33 9.92
		W	...	14 13 43.5	2 42.7	50.65	50.10	.....	351 54 33.22	+ 2.15	+15.96	- 54.64	
11	<i>f</i> Boötis	W	2.5	14 19 14.0	2 46.7	50.15	49.70	.....	17 5 53.32	+ 1.75	+33.64	- 19.49	+19 39 1.22
		E	...	14 24 39.0	2 38.3	50.65	50.00	.....	55 38 48.72	+ 2.11	-30.34	+ 19.50	
12	6 B. Libræ	E	3	14 29 8.0	2 47.6	50.15	49.50	.....	87 11 8.65	+ 1.61	-15.05	+1 8.30	-11 54 23.41
		W	...	14 34 43.0	2 47.4	51.10	50.50	.....	345 33 34.15	+ 2.63	+15.01	-1 8.30	
13	109 Virginis	W	2.5	14 38 49.0	2 36.5	50.55	50.00	.....	359 44 50.70	+ 2.06	+17.41	- 41.43	+ 2 17 20.26
		E	...	14 44 14.5	2 49.0	50.10	49.55	.....	72 59 58.72	+ 1.57	-20.30	+ 41.44	
14	δ Libræ	E	2.5	14 54 50.0	1 2.8	50.05	49.45	.....	83 25 27.90	+ 1.56	- 2.26	+ 59.87	- 8 8 47.64
		W	...	14 58 18.0	2 25.2	52.25	51.50	.....	349 19 2.68	+ 3.72	+12.10	- 59.90	
15	ι Lupi	W	4	15 6 5.0	2 43.0	51.45	50.85	.....	326 19 15.75	+ 2.98	+10.26	-2 32.55	-31 10 10.14
		E	...	15 11 36.0	2 48.0	50.25	49.50	.....	106 25 26.55	+ 1.68	-10.90	+2 32.58	
16	η Coronæ Borealis	E	2.5	15 19 ....	.....	50.00	49.15	26.613	44 38 36.72	+ 2.07	+ 0.20	+ 8.14	+30 37 43.05
		W	...	.....	.....	52.05	51.30	26.613	28 3 44.10	+ 4.27	- 0.20	- 8.14	
17	B. D. +43° 25' 10"	W	2.5	15 32 ....	.....	51.60	51.00	25.304	40 55 35.25	+ 2.42	- 0.32	+ 4.46	+43 28 50.51
	June 7, L.	E	...	.....	.....	50.00	49.20	25.304	31 48 37.50	+ 0.63	+ 0.32	- 4.46	
18	61 Virginis	W	3	13 10 41.0	2 43.8	49.35	49.05	.....	339 40 48.82	+ 0.12	+12.97	-1 22.42	-17 47 26.67
		E	...	13 16 11.0	2 46.2	50.95	51.15	.....	93 3 54.88	+ 2.06	-13.35	+1 22.45	
19	73 Virginis	E	3	13 24 6.0	2 48.3	50.85	51.00	.....	93 31 14.15	+ 1.91	-13.59	+1 23.92	-18 14 47.11
		W	...	13 29 46.0	2 51.7	50.60	50.55	.....	339 13 27.20	+ 1.56	+14.14	-1 23.95	
20	τ Boötis	W	2.5	13 40 21.5	2 21.8	49.95	50.10	.....	15 22 37.05	+ 0.96	+22.66	- 20.88	+17 55 33.15
		E	...	13 45 25.5	2 42.2	50.70	51.00	.....	57 22 13.68	+ 1.78	-29.64	+ 20.89	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
2 13 28	73.8	.....	.....	16. Instrument in meridian, observation at I with movable thread.	1	36 22 22.86	.....
13 37	74.2	.....	.....	17. Instrument in meridian, observation at IX with movable thread.	2	24.18	.....
13 48	73.9	.....	.....		3	24.08	+9.49
13 57	73.4	74.7	29.865		4	23.09	.....
4 13 14	72.0	75.2	29.950		5	24.39	.....
13 25	71.5	.....	.....		6	23.01	.....
13 39	71.1	.....	.....		7	23.70	+6.44
13 48	70.5	.....	.....		8	23.42	+9.56
13 57	70.2	73.0	29.946		9	23.44	.....
14 11	69.8	.....	.....		10	23.22	.....
14 22	69.7	.....	.....		11	24.60	.....
14 32	69.5	.....	.....		12	23.50	+3.04
14 42	69.5	71.6	29.948		13	25.08	.....
15 1	68.8	.....	.....		14	22.84	+1.25
15 9	68.5	.....	.....		15	23.18	+3.93
15 19	68.5	.....	.....		16	23.12	.....
15 30	68.1	70.7	29.948		17	23.99	-7.15
7 13 14	79.3	81.6	29.739		18	22.76	.....
13 27	79.0	.....	.....		19	22.67	+7.76
13 43	78.5	.....	.....		20	23.25	.....

Notes.
1. Faint; clouds.
4. Diffuse.
12. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	τ Virginis	E	2.5	13 54 7.0	2 40.4	50.50	50.85	.....	73 17 18.08	+ 1.64	-18.16	+ 40.86	+ 1 59 56.51
		W	...	13 59 29.0	2 41.6	50.80	50.95	.....	359 27 22.80	+ 1.85	+18.44	- 40.87	
2	ε Virginis	W	3	14 8 12.0	2 48.9	49.95	50.50	.....	351 54 31.08	+ 1.15	+17.20	- 53.41	- 5 33 9.87
		E	...	14 13 39.5	2 38.6	50.75	51.20	.....	80 50 8.82	+ 1.90	-15.16	+ 53.42	
3	f Boötis	E	3	14 19 2.0	2 58.7	50.55	51.10	.....	55 38 54.68	+ 1.78	-38.65	+ 19.07	+19 39 1.98
		W	...	14 24 44.5	2 43.8	50.55	51.20	.....	17 5 52.32	+ 1.88	+32.49	- 19.07	
4	109 Virginis	E	3	14 39 36.0	1 49.6	50.35	50.15	.....	72 59 45.42	+ 1.23	- 8.54	+ 40.49	+ 2 17 20.59
		W	...	14 43 38.0	2 12.4	50.70	50.55	.....	359 44 53.02	+ 1.58	+12.46	- 40.49	
5	June 11, L. 73 Virginis	W	3.5	13 24 18.0	2 36.5	50.80	50.85	.....	339 13 32.50	+ 1.80	+11.75	-1 25.89	-18 14 46.41
		E	...	13 29 28.0	2 33.5	51.30	51.25	.....	93 31 9.35	+ 2.24	-11.30	+1 25.93	
6	83 Virginis	E	3.5	13 36 57.0	2 24.4	51.10	51.00	.....	90 58 57.08	+ 2.00	-10.45	+1 18.20	-15 42 28.54
		W	...	13 42 8.0	2 46.6	52.35	51.90	.....	341 45 38.60	+ 3.15	+13.91	-1 18.24	
7	7 Boötis	W	3.5	13 46 6.0	2 33.1	51.85	51.25	.....	15 50 47.02	+ 2.51	+26.92	- 20.87	+18 23 49.20
		E	...	13 51 29.0	2 49.9	50.90	50.45	.....	56 54 1.12	+ 1.56	-33.14	+ 20.89	
8	94 Virginis	E	3.5	13 58 26.0	2 49.0	50.95	50.25	.....	83 43 32.02	+ 1.58	-16.30	+1 0.49	- 8 26 38.21
		W	...	14 5 21.0	4 6.0	52.20	51.55	.....	349 0 51.30	+ 2.84	+34.52	-1 0.53	
9	f Boötis	E	3	14 19 21.5	2 39.4	50.00	49.30	.....	55 38 46.80	+ 0.56	-30.76	+ 19.54	+19 39 2.56
		W	...	14 24 47.0	2 46.1	52.20	51.35	.....	17 5 51.35	+ 2.80	+33.40	- 19.54	
10	Piazz 166	W	3.5	14 38 16.0	2 31.2	51.10	50.55	.....	336 41 46.25	+ 1.83	+10.51	-1 35.32	-20 46 42.99
		E	...	14 43 28.0	2 40.8	49.95	49.40	.....	96 2 58.45	+ 0.59	-11.88	+1 35.33	
11	η Coronæ Borealis	W	3	15 19 .....	.....	52.10	51.20	26.644	28 3 46.18	+ 2.09	- 0.13	- 8.17	+30 37 43.75
		E	...	.....	.....	49.60	48.90	26.644	44 38 37.85	- 0.44	+ 0.13	+ 8.17	
12	B. D. +43° 2510	E	3	15 32 .....	.....	49.80	49.00	25.237	31 48 36.98	+ 0.88	+ 0.21	- 4.48	+43 28 52.01
		W	...	.....	.....	53.35	52.25	25.237	40 55 35.68	+ 4.42	- 0.21	+ 4.48	
13	κ Serpentis	W	3	15 41 36.0	2 50.7	52.50	51.50	.....	15 52 50.32	+ 2.98	+33.50	- 20.99	+18 25 58.79
		E	...	15 47 16.5	2 49.8	49.75	49.25	.....	56 51 53.15	+ 0.47	-33.15	+ 21.00	
14	49 Libræ	E	3.5	15 52 19.0	2 40.5	49.85	49.20	.....	91 31 55.05	+ 0.50	-12.78	+1 20.54	-16 15 23.52
		W	...	15 57 43.0	2 43.5	53.60	52.55	.....	341 12 46.25	+ 4.07	+13.26	-1 20.56	
15	ε Scorpæ	W	4	16 3 40.0	2 47.4	52.85	51.65	.....	329 48 3.15	+ 3.30	+11.47	-2 9.04	-27 40 57.28
		E	...	16 9 12.0	2 44.6	49.70	48.55	.....	102 56 38.65	+ 0.01	-11.09	+2 9.11	
16	ρ Ophiuchi (mean)	E	3.5	16 17 10.0	2 43.4	50.30	49.50	.....	98 29 52.68	+ 0.88	-11.77	+1 46.04	-23 13 48.71
		W	...	16 22 35.0	2 41.6	53.20	52.10	.....	334 14 48.08	+ 3.64	+11.52	-1 46.07	
17	June 20, L. α Ursæ Minoris S. P.	W	2.5	13 18 2.0	7 2.7	49.30	50.35	.....	88 37 48.02	+ 1.01	+ 2.00	+1 11.04	+88 48 2.55
		E	...	13 23 0.0	2 4.7	49.15	50.05	.....	344 6 50.98	+ 0.73	- 0.17	-1 11.09	
18	α Ursæ Minoris S. P.	E	3	13 27 14.0	2 9.3	48.90	49.70	.....	344 6 51.90	+ 0.43	- 0.19	-1 11.14	+88 48 2.59
		W	...	13 31 10.0	6 5.3	49.95	50.55	.....	88 37 48.42	+ 1.45	+ 1.50	+1 11.17	
19	June 25, L. α Ursæ Minoris S. P.	E	3	13 18 40.0	6 29.8	48.75	49.50	.....	344 6 52.85	+ 0.88	- 1.70	-1 10.24	+88 48 3.02
		W	...	13 22 40.0	2 29.8	50.15	50.95	.....	88 37 49.55	+ 2.37	+ 0.25	+1 10.29	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
d 4 m	78.3	80.1	29.740	11. Instrument in meridian, observation at VIII with movable thread.	12. Instrument in meridian, observation at II with movable thread.			1	30 22 22.32	.....
7 11 57	78.3	80.1	29.740					2	22.50	.....
14 5	77.9	80.1	29.740					3	22.25	.....
14 11	77.5	80.1	29.740					4	22.48	.....
14 22	77.0	80.1	29.740					5	23.19	+ 7.82
14 46	77.0	80.1	29.740					6	22.48	+ 6.52
14 52	77.0	80.1	29.740					7	23.00	- 3.02
15 0	79.0	80.1	29.740					8	22.96	.....
11 11 37	68.1	70.4	29.794					9	22.08	.....
11 40	67.6	70.4	29.794					10	22.88	+ 4.49
11 49	67.1	70.4	29.794					11	23.85	.....
14 1	66.9	70.4	29.794					12	22.54	- 8.83
14 18	66.3	70.4	29.794					13	23.04	.....
14 21	66.0	70.4	29.794					14	23.16	.....
14 42	65.8	70.4	29.794					15	22.78	+ 0.11
15 0	67.6	70.4	29.794					16	22.60	- 0.17
15 17	64.6	70.4	29.794					17	21.26	.....
15 30	64.3	70.4	29.794					18	21.77	.....
15 58	61.7	70.4	29.794					19	22.12	.....
16 15	61.6	70.4	29.794							
16 27	62.9	70.4	29.794							
16 36	62.6	70.4	29.794							
16 11 17	72.0	81.1	29.728							
16 11 32	70.9	81.1	29.728							
26 11 17	79.6	81.1	29.728							

Notes.

4. Clouds.
 11. Micrometer reading decreased 1 rev.
 12. One level reading increased 10 div.
 17. Very faint; clouds.
 19. Thermometer reading changed from 29.798 to 29.748 rev.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ursæ Minoris S. P.	W	3	13 27 0.0	1 50.2	50.35	51.25	.....	88 37 49.45	+ 2.63	+ 0.14	+1 10.34	+88 48 2.91
		E	...	13 31 30.0	6 20.2	48.55	49.40	.....	344 6 52.95	+ 0.73	- 1.62	-1 10.40	
2	7 Boötis	E	3	13 47 26.0	1 13.6	49.05	49.80	.....	56 53 32.55	+ 1.21	- 6.22	+ 20.50	+18 23 51.25
		W	...	13 50 58.0	2 18.4	50.90	51.55	.....	15 50 52.75	+ 3.03	+22.00	- 20.52	
3	94 Virginis	W	3	13 58 36.0	2 39.5	49.80	50.85	.....	349 1 12.40	+ 2.08	+14.52	- 59.43	- 8 26 37.52
		E	...	14 4 8.0	2 52.5	49.00	49.85	.....	83 43 34.20	+ 1.21	-16.98	+ 59.46	
4	λ Boötis	E	2.5	14 13 ....	.....	48.95	49.70	27.399	28 44 38.98	+ 1.66	+ 0.23	- 7.32	+46 31 24.08
		W	...	.....	.....	50.65	51.20	27.399	43 56 38.05	+ 3.30	- 0.23	+ 7.32	
5	52 Hydræ	W	3.5	14 20 23.0	2 13.8	49.95	50.60	.....	128 24 55.05	+ 2.06	+ 7.16	-2 14.59	-29 4 16.08
		E	...	14 25 54.0	3 17.2	48.95	49.55	.....	104 19 54.98	+ 1.06	-15.56	+2 14.64	
6	33 Boötis	E	2	14 35 ....	.....	48.90	49.70	26.980	30 27 30.20	+ 1.81	+ 0.34	- 5.67	+44 48 48.00
		W	...	.....	.....	51.00	51.60	26.980	42 14 20.25	+ 3.82	- 0.34	+ 5.67	
7	8 Libræ	W	3	14 42 54.0	2 32.0	50.20	50.80	.....	341 51 43.80	+ 2.32	+11.60	-1 16.93	-15 36 25.98
		E	...	14 48 17.0	2 51.0	49.05	49.80	.....	90 53 2.55	+ 1.19	-14.67	+1 16.97	
8	β Boötis	E	2.5	14 58 ....	.....	48.90	49.60	26.794	34 30 31.40	+ 1.72	+ 0.29	- 1.77	+40 45 50.98
		W	...	.....	.....	50.85	51.40	26.794	38 11 35.15	+ 3.69	- 0.29	+ 1.77	
9	δ Boötis	W	3	15 12 ....	.....	50.40	51.05	25.960	31 6 31.80	+ 1.92	- 0.14	- 5.06	+33 40 5.04
		E	...	.....	.....	48.60	49.10	25.960	41 36 46.50	+ 0.01	+ 0.14	+ 5.06	
10	ν^1 Boötis	E	2.5	15 28 ....	.....	48.55	49.30	26.008	34 7 32.45	+ 1.28	+ 0.19	- 2.15	+41 9 22.90
		W	...	.....	.....	51.00	51.50	26.008	38 35 38.65	+ 3.68	- 0.19	+ 2.15	
11	κ Serpentis	E	3	15 42 19.0	2 8.3	48.50	48.80	.....	56 51 36.28	+ 0.42	-18.93	+ 20.59	+18 26 0.48
		W	...	15 47 6.5	2 39.2	58.90	51.30	.....	15 52 54.58	+ 2.91	+29.15	- 20.61	
12	49 Libræ	W	3	15 52 12.0	2 48.1	49.95	50.35	.....	341 12 47.82	+ 1.93	+14.02	-1 19.03	-16 15 22.76
		E	...	15 57 40.5	2 40.4	48.25	48.50	.....	91 31 57.08	+ 0.16	-12.76	+1 19.05	
13	ϵ^1 Scorpii	E	3.5	16 3 52.0	2 36.1	48.30	48.55	.....	102 56 41.08	+ 0.16	- 9.98	+2 6.50	-27 40 57.87
		W	...	16 9 15.0	2 46.9	50.70	51.05	.....	329 48 1.12	+ 2.72	+11.41	-2 6.51	
14	ρ Ophiuchi (mean)	W	3	16 17 15.0	2 39.1	50.50	50.60	.....	334 14 48.28	+ 2.33	+11.16	-1 43.87	-23 13 48.26
		E	...	16 22 47.0	2 52.9	48.45	48.70	.....	98 29 56.65	+ 0.36	-13.18	+1 43.88	
15	June 26, L. α Ursæ Minoris	E	2.5	1 23 0.0	2 11.2	49.65	49.30	.....	346 30 38.20	+ 0.16	+ 0.20	-1 5.52	+88 48 0.93
		W	...	1 27 20.0	2 8.8	50.00	49.70	.....	86 13 55.72	+ 0.59	- 0.19	+1 5.49	
16	June 28, L. α Ursæ Minoris	E	2.5	1 18 40.0	6 33.2	50.00	50.55	.....	346 30 35.52	+ 1.20	+ 1.79	-1 4.88	+88 48 0.49
		W	...	1 23 6.0	2 7.2	49.45	49.70	.....	86 13 56.15	+ 0.55	- 0.19	+1 4.80	
17	α Ursæ Minoris	W	3	1 27 20.0	2 6.8	49.00	49.20	.....	86 13 56.28	+ 0.06	- 0.19	+1 4.73	+88 47 59.95
		E	...	1 31 50.0	6 36.8	49.70	49.70	.....	346 30 36.50	+ 0.63	+ 1.82	-1 4.68	
18	June 29, L. α Ursæ Minoris S. P.	E	2.5	13 18 30.0	6 43.7	48.55	50.20	.....	344 6 51.18	+ 0.17	- 1.83	-1 8.93	+88 48 2.56
		W	...	13 23 6.0	2 7.7	49.00	50.55	.....	88 37 52.38	+ 0.63	+ 0.18	+1 8.98	
19	α Ursæ Minoris S. P.	W	2.5	13 27 0.0	1 46.3	48.90	50.40	.....	88 37 52.55	+ 0.50	+ 0.13	+1 9.01	+88 48 2.48
		E	...	13 31 36.0	6 22.3	48.65	50.15	.....	344 6 50.95	+ 0.20	- 1.64	-1 9.06	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
25 13 32	78.3	.....	.....	4, 10.	Instrument in meridian, observation at II with movable thread.				1	36 22 22.11	.....
13 51	76.5	.....	.....	6, 8.	Instrument in meridian, observation at I with movable thread.				2	22.65	-5.31
14 3	76.1	.....	.....	9.	Instrument in meridian, observation at VIII with movable thread.				3	23.73	.....
14 11	75.8	.....	.....	15, 16, 17.	Instrument in meridian, observation assumed as between fixed thread and movable at 25.150 rev.				4	22.84	.....
14 23	75.5	77.0	29.834						5	22.40	+7.77
14 34	75.2	.....	.....						6	22.77	.....
14 45	74.6	.....	.....						7	23.42	.....
14 57	74.1	.....	.....						8	23.11	.....
15 10	74.5	.....	.....						9	23.20	.....
15 22	74.1	76.1	29.836						10	23.07	.....
15 45	73.5	.....	.....						11	22.20	.....
15 55	73.1	.....	.....						12	24.14	.....
16 6	73.1	.....	.....						13	23.25	+0.73
16 21	73.0	74.7	29.836						14	22.80	-0.89
26 1 18	71.8	.....	.....						15	22.22	.....
1 28	72.1	73.0	29.863						16	22.37	.....
28 1 19	76.8	.....	.....						17	22.48	.....
1 26	77.6	.....	.....						18	21.38	.....
1 32	78.3	77.6	29.843						19	21.32	.....
29 13 18	88.0	89.4	29.767								
13 32	87.0	.....	.....						

Note.
2. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	τ Boötis	E	2.5	13 40 8.5	2 35.4	50.50	50.65	.....	57 22 9.00	+ 1.23	-27.21	+ 20.57	+17 55 35.89
		W	...	13 45 38.5	2 54.6	50.70	50.45	.....	15 22 27.05	+ 1.25	+34.35	- 20.58	
2	λ Boötis	W	2	14 13 ....	.....	49.95	49.95	27.533	43 56 37.18	- 0.12	- 0.36	+ 7.17	+46 31 24.77
		E	...	.....	.....	50.25	50.45	27.533	28 44 34.15	+ 0.29	+ 0.36	- 7.17	
3	52 Hydræ	E	4	14 20 16.0	2 20.9	50.20	50.35	.....	104 19 49.80	+ 1.01	- 7.94	+2 11.95	-29 4 15.97
		W	...	14 25 52.0	3 15.1	50.95	50.95	.....	328 24 44.70	+ 1.65	+15.23	-2 12.00	
4	33 Boötis	W	2.5	14 35 ....	.....	50.45	50.50	27.097	42 14 19.28	+ 0.57	- 0.22	+ 5.56	+44 48 49.71
		E	...	.....	.....	50.50	50.55	27.097	30 27 23.75	+ 0.66	+ 0.22	- 5.56	
5	8 Libræ	E	3	14 42 48.0	2 38.0	50.55	50.60	.....	90 53 1.65	+ 1.28	-12.53	+1 15.28	-15 36 26.02
		W	...	14 48 13.0	2 47.0	51.45	51.05	.....	341 51 39.02	+ 2.00	+14.00	-1 15.28	
6	β Boötis	W	3	14 58 ....	.....	51.00	50.70	26.917	38 11 38.55	+ 1.01	- 0.19	+ 1.73	+40 45 54.43
		E	...	.....	.....	50.55	50.50	26.917	34 30 26.45	+ 0.62	+ 0.19	- 1.73	
7	δ Boötis	E	2.5	15 12 ....	.....	50.55	50.50	25.668	41 36 54.80	+ 1.95	+ 0.22	+ 4.95	+33 40 6.09
		W	...	.....	.....	51.55	51.35	25.668	31 6 43.08	+ 2.89	- 0.22	- 4.95	
8	ν ¹ Boötis	W	2.5	15 28 ....	.....	51.20	50.90	26.237	38 35 32.85	+ 1.07	- 0.29	+ 2.10	+41 9 24.35
		E	...	.....	.....	50.75	50.40	26.237	34 7 21.58	+ 0.57	+ 0.29	- 2.10	
9	β Serpentis	E	3	15 39 4.5	2 43.3	50.55	50.15	.....	59 34 39.52	+ 1.03	-27.64	+ 23.12	+15 43 3.39
		W	...	15 44 40.0	2 52.2	51.85	51.15	.....	13 9 59.62	+ 2.28	+30.74	- 23.12	
10	γ Serpentis	W	2.5	15 49 14.5	2 49.1	50.95	50.40	.....	13 25 11.00	+ 1.40	+29.91	- 22.85	+15 58 12.65
		E	...	15 54 49.0	2 45.4	50.85	50.50	.....	59 19 31.85	+ 1.40	-28.62	+ 22.84	
11	κ Herculis	E	3	16 1 3.5	2 43.3	50.60	50.10	.....	57 59 48.60	+ 1.09	-29.32	+ 21.38	+17 17 57.75
		W	...	16 6 32.0	2 45.2	52.20	51.80	.....	14 44 52.60	+ 2.73	+30.00	- 21.39	
12	σ Serpentis	W	3	16 14 29.0	2 46.7	51.40	50.90	.....	358 42 31.62	+ 1.85	+19.29	- 41.63	+ 1 15 4.26
		E	...	16 19 56.0	2 40.3	50.90	50.60	.....	74 2 10.70	+ 1.42	-17.84	+ 41.63	
13	34 Herculis	E	2.5	16 24 43.0	2 45.2	51.20	50.80	.....	26 6 57.60	+ 1.72	+42.55	- 9.77	+49 10 7.57
		W	...	16 30 16.0	2 47.8	52.50	52.00	.....	46 37 45.02	+ 3.04	-43.90	+ 9.78	
14	June 30, L. φ Virginis	W	3.5	14 20 31.0	2 47.1	51.50	51.35	.....	355 39 8.85	+ 0.26	+18.15	- 46.00	- 1 48 23.63
		E	...	14 26 2.0	2 43.9	51.70	51.85	.....	77 5 32.60	+ 0.63	-17.46	+ 46.04	
15	61 B. Draconis	E	2.5	14 46 26.5	2 33.2	52.80	52.10	.....	15 36 54.08	+ 1.30	+14.18	- 20.36	+59 40 48.57
		W	...	14 51 59.0	2 59.3	53.60	52.85	.....	57 7 49.95	+ 2.14	-19.43	+ 20.38	
16	ε Libræ	W	3.5	15 4 13.0	2 35.7	52.45	51.55	.....	338 2 6.90	+ 0.90	+11.39	-1 27.00	-19 26 12.58
		E	...	15 9 33.0	2 44.3	52.05	51.55	.....	94 42 35.65	+ 0.62	-12.69	+1 27.07	
17	ο ² Libræ	E	3.5	15 15 2.0	2 42.1	52.25	51.75	.....	90 4 33.40	+ 0.82	-13.37	+1 13.25	-14 47 56.15
		W	...	15 20 25.0	2 40.9	53.35	52.65	.....	342 40 6.72	+ 1.92	+13.17	+1 13.30	
18	ν ² Boötis	W	2.5	15 28 ....	.....	52.85	51.95	23.113	38 41 32.85	+ 0.70	- 0.19	+ 2.17	+41 13 17.43
		E	...	.....	.....	51.50	51.05	23.113	34 5 36.40	- 0.45	+ 0.19	- 2.17	
19	β Serpentis	W	3	15 39 3.0	2 44.8	50.75	51.35	.....	13 10 2.30	+ 2.90	+28.15	- 23.16	+15 43 3.83
		E	...	15 44 24.5	2 36.7	48.65	49.50	.....	59 34 37.32	+ 0.80	-25.46	+ 23.17	
20	γ Serpentis	E	3	15 49 16.0	2 47.6	48.45	49.05	.....	59 19 31.72	+ 0.50	-29.38	+ 22.91	+15 58 12.77
		W	...	15 54 50.0	2 46.4	51.00	51.25	.....	13 25 9.02	+ 2.94	+28.96	- 22.92	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1906.0.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							
29 13 41	86.5	...	...	2.8	Instrument in meridian, observation at IX with movable thread.			1	56 22 22.81	...
14 11	85.1	...	...	4.0, 18.	Instrument in meridian, observation at VIII with movable thread.			2	21.06	...
14 21	84.2	...	...	7	Instrument in meridian, observation at I with movable thread.			3	22.20	+ 7.79
14 31	84.1	86.3	29.762					4	81.65	...
14 45	84.6	...	...					5	21.01	...
14 52	84.2	...	...					6	25.48	...
15 10	84.2	...	...					7	22.52	...
15 26	83.0	85.2	29.770					8	82.44	...
15 42	83.3	...	...					9	22.58	...
15 52	83.4	...	...					10	83.46	...
16 4	83.2	...	...					11	82.84	...
16 17	82.9	...	...					12	23.52	- 5.29
16 27	82.6	84.7	29.760					13	23.02	-12.73
30 14 21	86.1	88.0	29.701	Note.			14	81.54	- 0.59	
14 49	84.2	...	...	14 Clouds.			15	21.12	...	
15 7	83.2	...	...					16	21.42	...
15 18	82.0	...	...					17	21.10	...
15 27	81.9	83.0	29.704					18	21.57	-12.84
15 42	81.2	...	...					19	21.01	...
15 52	80.7	...	...					20	21.88	...

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	κ Herculis	W	3	16 1 8.0	2 38.8	49.30	50.00	.....	14 44 56.70	+ 1.41	+27.72	- 21.46	+17 17 58.13
		E	...	16 6 30.5	2 43.7	49.00	49.75	.....	57 59 48.25	+ 1.16	-29.46	+ 21.47	
2	σ Serpentis	E	3	16 14 27.5	2 48.2	48.80	49.30	.....	74 2 11.85	+ 0.76	-19.64	+ 41.78	+ 1 15 4.41
		W	...	16 20 11.0	2 55.3	50.15	50.70	.....	358 42 28.55	+ 2.17	+21.34	- 41.80	
3	34 Herculis	W	3	16 24 49.5	2 38.7	49.50	50.35	.....	46 37 40.32	+ 1.71	-39.26	+ 9.81	+49 10 7.69
		E	...	16 30 17.0	2 48.8	48.45	49.20	.....	26 6 55.32	+ 0.56	+44.43	- 9.82	
4	July 2, L. Piazzii 166	E	3	14 38 12.0	2 35.9	49.70	50.75	.....	96 2 58.75	+ 0.80	-11.17	+1 31.60	-20 46 42.31
		W	...	14 43 30.0	2 42.1	50.00	50.95	.....	336 41 40.58	+ 1.08	+12.08	-1 31.70	
5	43 B. Libræ	W	3	14 49 14.0	2 41.6	49.30	50.35	.....	336 28 50.70	+ 0.38	+11.96	-1 32.48	-20 59 33.90
		E	...	14 54 31.0	2 35.4	49.20	50.15	.....	96 15 50.00	+ 0.26	-11.06	+1 32.47	
6	ϵ Libræ	E	3.5	15 4 13.0	2 35.8	49.15	50.35	.....	94 42 35.08	+ 0.29	-11.41	+1 27.08	-19 26 12.43
		W	...	15 9 29.0	2 40.2	49.85	50.65	.....	338 2 7.02	+ 0.87	+12.06	-1 27.09	
7	July 5, L. φ Virginis	E	2.5	14 20 28.5	2 49.8	49.25	49.85	.....	77 5 32.45	+ 0.88	-18.74	+ 47.77	- 1 48 23.63
		W	...	14 26 6.0	2 47.7	49.85	50.40	.....	355 39 9.82	+ 1.45	+18.28	- 47.77	
8	μ Virginis	W	3	14 35 14.0	2 49.2	49.25	49.85	.....	352 12 43.80	+ 0.85	+17.36	- 53.94	- 5 14 58.04
		E	...	14 40 39.5	2 36.3	49.20	49.70	.....	80 31 57.52	+ 0.80	-14.81	+ 53.96	
9	43 B. Libræ	E	3	14 49 11.0	2 44.7	49.35	49.80	.....	96 15 48.92	+ 0.92	-12.42	+1 35.66	-20 59 34.62
		W	...	14 54 30.0	2 34.3	50.55	51.15	.....	336 28 53.12	+ 2.19	+10.90	-1 35.70	
10	ϵ Libræ	E	3	15 4 5.0	2 43.9	49.50	50.05	.....	94 42 32.95	+ 1.07	-12.63	+1 30.05	-19 26 12.28
		W	...	15 9 33.0	2 44.1	50.95	51.60	.....	338 2 8.30	+ 2.68	+12.66	-1 30.07	
11	α^2 Libræ	W	3	15 15 9.0	2 35.3	50.65	51.25	.....	342 40 10.50	+ 2.34	+12.27	-1 15.72	-14 47 56.16
		E	...	15 20 31.0	2 46.7	49.30	49.75	.....	90 4 32.62	+ 0.82	-14.14	+1 15.74	
12	ν^2 Boötis	E	...	15 28 .....	.....	49.20	49.65	25.919	34 3 40.72	+ 1.50	+ 0.29	- 2.24	+41 13 17.86
		W	...	.....	.....	50.90	51.45	25.919	38 39 37.45	+ 3.28	- 0.29	+ 2.24	
13	ϵ Serpentis	W	2.5	15 34 23.7	2 54.8	50.45	51.15	.....	17 25 17.18	+ 2.15	+37.52	- 19.16	+19 58 31.31
		E	...	15 40 7.0	2 48.5	49.45	49.95	.....	55 19 23.05	+ 1.04	-34.87	+ 19.17	
14	ρ Scorpii	E	4	15 48 27.0	2 35.3	49.15	49.50	.....	104 11 56.90	+ 0.67	- 9.67	+2 16.12	-28 56 25.14
		W	...	15 53 33.0	2 30.7	51.35	51.60	.....	328 32 44.65	+ 2.83	+ 9.11	-2 16.16	
15	τ Coronæ Borealis	W	3	16 6 .....	.....	50.90	51.20	25.662	34 10 34.92	+ 1.64	- 0.25	- 2.14	+36 43 58.85
		E	...	.....	.....	49.00	49.60	25.662	38 33 7.52	- 0.12	+ 0.25	+ 2.14	
16	τ Herculis	E	3	16 17 .....	.....	48.90	49.65	25.957	28 44 35.50	+ 1.29	+ 0.36	- 7.49	+46 32 26.62
		W	...	.....	.....	50.90	51.25	25.957	43 58 39.30	+ 3.14	- 0.36	+ 7.49	
17	λ Ophiuchi	W	3	16 23 18.0	2 49.6	50.35	50.70	.....	359 38 53.10	+ 1.86	+20.39	- 41.74	+ 2 11 27.78
		E	...	16 28 42.5	2 34.9	48.80	49.20	.....	73 5 40.32	+ 0.33	-17.01	+ 41.74	
18	July 7, L. ρ Boötis	W	3	14 28 .....	.....	49.20	48.95	.....	28 14 34.00	+ 0.52	- 0.03	- 7.97	+30 47 14.29
		E	...	.....	.....	49.60	48.70	.....	44 30 22.88	+ 0.30	+ 0.13	+ 7.97	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
30 16 4	80.3	.....	.....	12.16. Instrument in meridian, observation at I with movable thread.	1	36 22 22.90	.....
16 17	80.2	.....	.....	15. Instrument in meridian, observation at IX with movable thread.	2	22.50	- 5.42
16 28	79.6	80.8	29.710	18. Instrument in meridian; W. observation at VII; E. observation at VIII. Both observations between fixed thread and movable at 24.713 rev.	3	21.54	-13.02
2 14 37	83.6	86.3	29.683		4	21.01	+ 4.31
14 44	82.9	.....	.....		5	21.12	.....
14 52	83.1	.....	.....		6	21.95	.....
14 55	83.1	.....	.....		7	22.07	- 0.92
15 4	82.6	.....	.....		8	22.77	.....
15 10	82.5	.....	.....		9	21.80	.....
15 27	81.6	84.6	29.689		10	22.50	.....
5 14 21	73.2	75.0	30.053		11	22.22	.....
14 26	73.1	.....	.....		12	22.88	-13.79
14 38	72.6	.....	.....		13	23.04	- 9.33
14 52	72.2	.....	.....		14	22.22	+ 2.33
15 7	71.9	.....	.....		15	22.90	-18.85
15 18	71.8	.....	.....		16	22.58	.....
15 27	71.5	73.8	30.072		17	22.50	.....
15 37	71.2	.....	.....	Note.	18	24.98	.....
15 51	70.6	.....	.....	6, 10. Faint; clouds.			
16 4	70.4	.....	.....		
16 15	69.9	.....	.....		
16 26	69.8	71.7	30.086				
7 14 28	70.5	74.3	30.014				
14 38	70.1	.....	.....		

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>μ</i> Virginis	E	2.5	14 35 21.0	2 42.3	49.45	48.50	.....	80 31 59.62	+ 0.79	-15.98	+ 54.12	- 5 14 57.42
		W	...	14 40 46.5	2 43.2	50.10	49.15	.....	352 12 46.98	+ 1.39	+16.15	- 54.15	
2	61 B. Draconis	W	3	14 46 42.0	2 17.8	49.65	48.45	.....	57 7 45.15	+ 0.87	-11.48	+ 21.14	+59 40 49.05
		E	...	14 51 42.0	2 42.2	49.05	48.00	.....	15 36 55.88	+ 0.28	+15.90	- 21.14	
3	3 Serpentis	E	3	15 8 8.0	2 20.0	49.00	47.50	.....	69 59 56.12	+ 0.06	-14.96	+ 37.13	+ 5 17 22.49
		W	...	15 13 14.5	2 46.5	52.95	51.45	.....	2 44 41.95	+ 4.03	+21.15	- 37.14	
4	θ Coronæ Borealis	W	3.5	15 29 ....	.....	50.75	49.50	25.534	29 7 34.18	+ 1.37	- 0.13	- 7.10	+31 40 45.85
		E	...	.....	.....	50.35	48.95	25.534	43 36 21.90	+ 0.82	+ 0.13	+ 7.10	
5	ε Serpentis	E	3	15 34 54.5	2 24.1	50.45	48.90	.....	55 19 14.00	+ 1.48	-25.50	+ 19.19	+19 58 31.53
		W	...	15 40 14.0	2 55.4	51.40	49.95	.....	17 25 17.80	+ 2.50	+37.78	- 19.20	
6	ρ Scorpii	W	3	15 48 21.0	2 41.4	50.40	48.95	.....	328 32 47.95	+ 1.45	+10.44	-2 16.28	-28 56 24.89
		E	...	15 53 44.0	2 41.6	50.35	49.00	.....	104 11 59.32	+ 1.51	-10.47	+2 16.31	
7	τ Coronæ Borealis	E	2.5	16 6 ....	.....	50.50	49.00	25.613	38 33 8.98	+ 2.12	+ 0.16	+ 2.14	+36 43 59.17
		W	...	.....	.....	51.60	49.85	25.613	34 10 37.58	+ 3.11	- 0.16	- 2.14	
8	τ Herculis	W	2.5	16 17 ....	.....	51.20	49.50	26.077	43 58 39.40	+ 1.56	- 0.23	+ 7.49	+46 32 27.85
		E	...	.....	.....	50.40	48.60	26.077	28 44 32.45	+ 0.68	+ 0.23	- 7.49	
9	λ Ophiuchi	E	2.5	16 23 18.0	2 49.7	50.35	48.50	.....	73 5 50.05	+ 1.25	-20.42	+ 41.74	+ 2 11 28.34
		W	...	16 28 53.0	2 45.3	51.30	49.50	.....	359 38 56.12	+ 2.20	+10.38	- 41.74	
10	July 9, L. ρ Boötis	E	2.5	14 28 ....	.....	51.00	49.75	25.184	44 30 7.35	+ 1.22	+ 0.13	+ 7.84	+30 47 12.47
		W	...	.....	.....	51.90	50.45	25.184	28 14 14.05	+ 2.05	- 0.13	- 7.84	
11	ζ Boötis	W	2.5	14 34 20.5	2 15.9	50.70	49.30	.....	11 35 13.82	+ 0.29	+18.13	- 25.33	+14 7 59.73
		E	...	14 39 12.5	2 36.1	51.40	49.90	.....	61 9 38.38	+ 0.97	-23.91	+ 25.35	
12	ξ Boötis	E	3	14 44 26.0	2 34.0	51.30	49.70	.....	55 48 12.22	+ 0.78	-28.52	+ 19.39	+19 29 35.77
		W	...	14 49 48.7	2 48.7	52.20	50.70	.....	16 56 25.52	+ 1.75	+34.21	- 19.40	
13	γ Scorpii	W	4	14 55 45.0	2 46.3	51.10	49.65	.....	332 33 56.65	+ 0.70	+11.86	-1 51.20	-24 54 49.35
		E	...	15 1 17.0	2 45.7	51.05	49.65	.....	100 10 49.92	+ 0.65	-11.77	+1 51.24	
14	ι Lupi	E	3.5	15 6 9.0	2 40.1	51.10	49.75	.....	106 25 30.08	+ 0.74	- 9.90	+2 30.18	-31 10 11.21
		W	...	15 11 40.0	2 50.9	52.20	50.75	.....	326 19 12.65	+ 1.81	+11.28	-2 30.40	
15	θ Coronæ Borealis	E	2.5	15 29 ....	.....	51.00	49.80	25.440	43 36 24.10	+ 1.40	+ 0.21	+ 7.00	+31 40 45.67
		W	...	.....	.....	52.35	50.80	25.440	29 7 35.28	+ 2.65	- 0.21	- 7.00	
16	χ Lupi	W	4	15 42 8.0	2 48.7	51.50	50.15	.....	324 9 13.70	+ 1.14	+10.59	-2 50.06	-33 20 31.22
		E	...	15 47 46.0	2 49.3	50.75	49.15	.....	108 35 31.18	+ 0.26	-10.67	+2 50.38	
17	τ Herculis	E	3	15 54 31.5	2 26.5	50.90	49.40	.....	57 12 53.90	+ 0.44	-24.33	+ 21.07	+18 4 49.63
		W	...	15 59 29.5	2 31.5	53.00	51.55	.....	15 31 49.42	+ 2.64	+26.03	- 21.08	
18	ν Scorpii	W	3.5	16 4 14.0	2 15.3	52.80	51.20	.....	338 15 27.00	+ 2.35	+ 8.64	-1 28.76	-19 12 57.95
		E	...	16 9 9.0	2 39.7	50.90	49.50	.....	94 29 21.25	+ 0.50	-12.03	+1 28.76	
19	23 Herculis	E	2.5	16 19 ....	.....	50.90	49.55	27.347	42 42 35.00	+ 1.24	+ 0.22	+ 6.18	+32 33 18.87
		W	...	.....	.....	53.55	51.85	27.347	29 58 49.65	+ 3.78	- 0.22	- 6.18	

Time.	Ther. 3892.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
7 14 49	70.4	...	...	4.8. Instrument in meridian, observation at VIII with movable thread.	1	36 22 24.46	...
15 11	69.7	...	...	7.10. Instrument in meridian, observation at II with movable thread.	2	23.30	...
17 28	69.5	71.3	30.010	15.19. Instrument in meridian, observation at I with movable thread.	3	24.17	...
18 17	69.2	...	...		4	24.82	-12.12
18 47	69.0	...	...		5	24.02	-9.53
18 59	68.8	...	...		6	25.12	+8.48
19 4	68.5	...	...		7	24.82	-13.20
19 15	68.2	...	...		8	24.90	...
19 26	68.5	69.8	30.006		9	24.29	...
9 14 26	75.2	77.3	29.768		10	23.74	...
14 37	74.5	...	...		11	23.85	...
14 47	71.4	...	...		12	22.98	-8.54
14 55	71.7	...	...		13	24.02	...
15 6	71.4	...	...		14	21.22	+5.89
15 9	72.8	...	...		15	21.56	-12.38
15 15	72.5	...	...		16	21.26	+4.10
15 28	72.5	74.6	29.768	Notes.	17	24.04	-9.65
15 45	71.9	...	...	2.1.4. Clouds	18	21.86	...
15 50	70.5	...	...	12.14. Very faint; clouds.	19	24.56	-12.77
15 57	70.2	...	...		
16 6	70.2	72.3	29.786				
16 18	70.5	...	...		
16 29	70.6	...	...		
16 46	...	72.4	29.796				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	July 12, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	ρ Boötis	W	2	14 28 . . . .	. . . .	48.85	49.40	25.283	28 14 13.18	- 0.26	- 0.13	- 7.90	+30 47 13.46
		E	...	. . . .	. . . .	50.05	50.75	25.283	44 30 2.22	+ 1.08	+ 0.13	+ 7.90	
2	ζ Boötis	E	2	14 34 4.3	2 32.1	49.85	50.40	.....	61 9 35.78	+ 1.37	-22.70	+ 25.52	+14 8 0.02
		W	...	14 39 12.3	2 35.9	49.25	49.95	.....	11 35 7.50	+ 0.82	+23.85	- 25.53	
3	ξ Boötis	W	2.5	14 44 22.0	2 38.1	48.95	49.70	.....	16 56 32.58	+ 0.52	+30.05	- 19.51	+19 29 36.80
		E	...	14 49 45.3	2 45.2	50.50	51.10	.....	55 48 14.65	+ 2.03	-32.81	+ 19.53	
4	γ Scorpii	E	3	14 55 47.0	2 44.4	50.50	51.05	.....	100 10 47.20	+ 2.01	-11.59	+1 52.02	-24 54 49.26
		W	...	15 1 23.0	2 51.6	49.90	50.55	.....	332 33 55.72	+ 1.48	+12.63	-1 52.06	
5	β Serpentis	W	2.5	15 7 46.0	2 42.0	49.40	50.05	.....	2 44 46.68	+ 0.94	+20.02	- 36.83	+ 5 17 22.90
		E	...	15 13 22.5	2 54.5	50.90	51.45	.....	70 0 2.32	+ 2.45	-23.23	+ 36.84	
6	τ^1 Serpentis	E	3	15 18 47.0	2 35.8	50.85	51.45	.....	59 32 0.55	+ 2.43	-25.21	+ 23.71	+15 45 39.01
		W	...	15 24 12.5	2 49.7	50.00	50.70	.....	13 12 38.38	+ 1.58	+29.90	- 23.72	
7	ϕ Boötis	W	...	15 34 . . . .	. . . .	49.85	50.55	25.264	38 6 37.75	+ 0.84	- 0.19	+ 1.69	+40 39 47.94
		E	...	. . . .	. . . .	50.80	51.35	25.264	34 37 37.30	+ 1.76	+ 0.19	- 1.69	
8	χ Lupi	E	3.5	15 42 4.0	2 52.8	50.70	51.20	.....	108 35 29.38	+ 2.22	-11.11	+2 51.14	-33 20 31.78
		W	...	15 47 47.0	2 50.2	49.85	50.50	.....	324 9 13.72	+ 1.41	+10.78	-2 51.19	
9	τ Herculis	W	2.5	15 54 16.5	2 41.6	49.45	50.05	.....	15 31 48.65	+ 1.00	+29.61	- 21.14	+18 4 50.16
		E	...	15 59 40.0	2 41.9	50.70	51.40	.....	57 12 57.45	+ 2.30	-29.72	+ 21.14	
10	ν Scorpii	E	3.5	16 4 20.0	2 9.4	50.45	51.05	.....	94 29 15.60	+ 2.00	- 7.90	+1 29.07	-19 12 58.30
		W	...	16 8 39.0	2 9.6	50.20	50.70	.....	338 15 28.28	+ 1.71	+ 7.92	-1 29.09	
11	β^2 Herculis	W	...	16 19 . . . .	. . . .	49.50	50.20	27.464	29 58 49.80	+ 0.34	- 0.22	- 6.21	+32 33 20.36
		E	...	. . . .	. . . .	50.35	50.95	27.464	42 42 28.78	+ 1.15	+ 0.22	+ 6.21	
12	σ Herculis	E	3	16 31 . . . .	. . . .	50.40	51.10	26.460	32 38 33.68	+ 2.56	+ 0.20	- 3.61	+42 38 5.49
		W	...	. . . .	. . . .	50.05	50.65	26.460	40 4 4.90	+ 2.14	- 0.20	+ 3.61	
13	k Herculis	W	3	16 43 17.0	2 26.0	49.05	49.70	.....	4 52 7.60	+ 0.63	+17.16	- 34.12	+ 7 24 43.39
		E	...	16 48 32.0	2 49.0	50.20	51.15	.....	67 52 44.82	+ 1.91	-23.00	+ 34.12	
14	α Libræ	E	3	14 43 2.0	2 35.9	51.00	51.85	.....	90 55 40.90	+ 2.73	-12.19	+1 17.22	-15 39 6.91
		W	...	14 48 21.0	2 43.1	50.00	50.65	.....	341 49 3.80	+ 1.59	+13.34	-1 17.25	
15	τ^1 Serpentis	W	2.5	15 18 40.5	2 42.4	48.65	49.50	.....	13 12 43.78	+ 0.30	+27.38	- 23.66	+15 45 38.54
		E	...	15 24 7.0	2 44.1	50.65	51.75	.....	59 32 5.92	+ 2.45	-27.96	+ 23.68	
16	ϕ Boötis	E	3	15 34 . . . .	. . . .	50.75	51.50	25.331	34 37 35.08	+ 2.99	+ 0.19	- 1.68	+40 39 47.73
		W	...	. . . .	. . . .	50.10	50.75	25.331	38 6 34.92	+ 2.27	- 0.19	+ 1.68	
17	η H. Draconis	W	2.5	15 42 43.0	2 28.2	49.30	50.10	.....	60 20 35.38	+ 0.94	-10.45	+ 24.61	+62 53 41.40
		E	...	15 47 48.0	2 36.8	50.10	50.95	.....	12 24 12.18	+ 1.78	+11.70	- 24.62	
18	δ H ¹ . Draconis	E	2.5	15 53 4.5	2 26.2	50.45	51.35	.....	20 16 25.92	+ 2.16	+18.75	- 15.99	+55 1 11.05
		W	...	15 58 13.0	2 42.3	49.85	50.50	.....	52 28 25.28	+ 1.41	-23.11	+ 16.00	
19	σ^2 Coronæ Borealis	W	3	16 11 . . . .	. . . .	49.45	50.00	26.050	31 32 28.60	+ 0.38	- 0.14	- 4.68	+34 6 1.68
		E	...	. . . .	. . . .	49.80	50.55	26.050	41 10 48.48	+ 0.85	+ 0.14	+ 4.68	
20	ω Herculis	E	3	16 18 31.0	2 30.9	50.05	50.85	.....	61 2 31.12	+ 1.70	-22.44	+ 25.47	+14 15 6.60
		W	...	16 23 36.5	2 34.6	49.65	50.00	.....	11 42 16.55	+ 1.06	+23.55	- 25.47	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
12 14 26	74.1	76.3	29.946	1, 7, 19. Instrument in meridian, observation at VIII with movable thread.	1	36 22 23.75	.....
14 36	73.9	.....	.....	11. Instrument in meridian, observation at IX with movable thread.	2	23.30	.....
14 47	73.4	.....	.....	12, 16. Instrument in meridian, observation at II with movable thread.	3	23.52	- 8.88
14 58	72.9	.....	.....		4	23.70	.....
15 11	72.7	.....	.....		5	24.60	.....
15 22	72.4	.....	.....		6	23.81	- 8.71
15 33	72.1	73.7	29.946		7	23.68	-14.75
15 45	71.6	.....	.....		8	23.18	+ 4.20
15 57	71.5	.....	.....		9	24.64	-10.09
16 7	71.1	.....	.....		10	23.80	.....
16 18	70.8	.....	.....		11	24.74	-13.34
16 29	70.5	.....	.....		12	25.34	.....
16 47	70.1	72.0	29.946		13	24.56	- 8.73
13 14 41	74.5	76.3	29.872		14	25.07	.....
14 49	74.2	.....	.....	Note.	15	25.94	- 8.85
15 21	72.0	.....	.....	10. Poor.	16	25.23	-14.93
15 33	71.8	.....	.....		17	25.76	-17.95
15 45	71.9	73.5	29.876		18	25.21	-17.06
15 56	71.5	.....	.....		19	26.12	.....
16 10	70.9	.....	.....		20	25.77	- 9.82
16 21	71.0	.....	.....		

No.	Date, observer, and object.	Cir- See- cle. ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	σ Herculis	W E	2.5 ... 16 31 ...	... ... ..	49.30 49.85	49.95 50.50	26.626 26.626	40 4 2.12 32 38 29.58	+ 0.12 + 0.53	- 0.31 + 0.45	+ 3.60 - 3.60	+42 38 5.96
2	114 B. Draconis	E W	2.5 ... 16 40 46.0 16 46 16.5	2 42.6 2 47.9	50.20 50.15	50.50 50.20	..... .....	18 20 23.30 54 24 25.90	+ 1.60 + 1.42	+19.76 -21.07	- 18.07 + 18.08	+56 57 15.55
3	117 G. Scorpii	W E	4 ... 16 53 16.0 16 58 24.0	2 30.0 2 38.0	49.80 50.05	50.10 50.45	..... .....	325 29 23.10 107 15 24.38	+ 1.22 + 1.53	+ 8.57 - 9.51	-2 38.63 +2 38.66	-32 0 13.72
4	A Ophiuchi (mean)	E W	4 ... 17 6 48.0 17 12 15.0	2 44.0 2 43.0	50.30 50.25	50.55 50.50	..... .....	101 43 40.18 331 1 6.80	+ 1.72 + 1.64	-11.24 +11.10	+2 0.43 -2 0.46	-26 27 49.32
5	b Ophiuchi	W E	4 ... 17 17 55.0 17 23 14.0	2 40.8 2 38.2	49.90 50.25	50.40 50.80	..... .....	333 23 29.18 99 21 19.20	+ 1.42 + 1.80	+11.24 -10.88	-1 48.51 +1 48.53	-24 5 15.98
6	ϕ Boötis	W E	3 ... 15 34 ... ... ..	... ... ..	48.35 48.30	50.30 50.10	25.327 25.327	38 6 38.90 34 37 38.48	+ 1.12 + 1.03	- 0.29 + 0.29	+ 1.67 - 1.67	+40 39 48.33
7	12 H. Draconis	E W	2.5 ... 15 42 33.0 15 48 5.0	2 38.2 2 53.8	48.45 49.40	49.90 50.80	..... .....	12 24 12.20 60 20 39.72	+ 1.70 + 2.65	+11.91 -14.37	- 24.41 + 24.41	+62 53 42.19
8	66 H ¹ . Draconis	W E	3 ... 15 52 57.5 15 58 12.5	2 33.3 2 41.7	48.85 47.75	50.20 49.25	..... .....	52 28 23.08 20 16 21.92	+ 2.06 + 1.00	-20.62 +22.94	+ 15.86 - 15.87	+55 1 11.89
9	σ^2 Coronæ Borealis	E W	3 ... 16 11 ... ... ..	... ... ..	48.15 49.30	49.55 50.65	26.058 26.058	41 10 47.15 31 32 26.28	+ 2.11 + 3.25	+ 0.22 - 0.22	+ 4.64 - 4.64	+34 6 1.97
10	ω Herculis	W E	3 ... 16 18 18.5 16 23 38.0	2 43.6 2 35.9	46.60 47.65	49.90 49.25	..... .....	11 42 14.90 61 2 33.88	+ 1.78 + 0.96	+26.38 -23.95	- 25.27 + 25.28	+14 15 7.50
11	k Herculis	E W	3 ... 16 43 29.0 16 48 16.0	2 13.3 2 33.7	47.45 49.15	48.75 50.20	..... .....	67 52 38.78 4 52 7.42	+ 0.60 + 2.20	-14.31 +19.02	+ 33.78 - 33.79	+ 7 24 44.69
12	117 G. Scorpii	E W	4 ... 16 53 12.0 16 58 34.0	2 34.1 2 47.9	47.45 49.15	48.90 50.35	..... .....	107 15 26.42 325 29 21.22	+ 0.71 + 2.31	- 9.04 +10.74	+2 37.50 -2 37.53	-32 0 12.73
13	A Ophiuchi (mean)	W E	3.5 ... 17 7 1.0 17 12 27.0	2 31.2 2 54.8	48.30 47.55	49.00 48.25	..... .....	331 1 11.02 101 43 45.48	+ 1.20 + 0.45	+ 9.55 -12.77	-1 59.61 +1 59.67	-26 27 48.65
14	b Ophiuchi	E W	4 ... 17 18 2.0 17 23 2.0	2 34.0 2 26.0	47.70 49.90	48.35 50.30	..... .....	99 21 21.40 333 23 29.30	+ 0.56 + 2.69	-10.31 + 9.27	+1 47.84 -1 47.85	-24 5 16.35
15	ν^1 Draconis	W E	3 ... 17 27 34.0 17 33 9.0	2 43.7 2 51.3	49.00 47.25	49.45 47.80	..... .....	52 42 24.68 20 2 24.22	+ 1.75 + 0.01	-23.04 +25.23	+ 16.18 - 16.18	+55 15 9.83
16	87 Herculis	E W	3 ... 17 44 30.0 17 47 22.7	0 28.4 2 24.3	48.00 50.20	48.60 50.55	..... .....	49 38 3.45 23 6 10.98	+ 0.80 + 2.93	- 1.34 +34.71	+ 13.02 - 13.02	+25 39 26.53
17	67 Ophiuchi	W E	3.5 ... 17 53 4.5 17 58 36.0	2 49.8 2 41.7	49.10 48.10	49.75 48.65	..... .....	0 23 46.65 72 21 1.92	+ 2.01 + 0.90	+20.80 -18.86	- 40.07 + 40.10	+ 2 56 19.35
18	μ Serpentis	W E	2.5 ... 15 42 2.0 15 47 19.5	2 38.5 2 39.0	47.80 47.85	49.40 49.65	..... .....	354 19 13.38 78 25 36.78	+ 1.47 + 1.62	+15.80 -15.99	- 49.19 + 49.20	- 3 8 28.34
19	δ Scorpii	E W	3.5 ... 15 51 53.0 15 57 24.0	2 51.4 2 39.6	47.85 48.00	49.65 49.50	..... .....	97 37 29.60 335 7 19.92	+ 1.62 + 1.62	-13.14 +11.40	+1 39.12 +1 39.15	-22 21 15.01

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
13 16 10	71.1	72.7	29.879	1. Instrument in meridian, W. observation at IX; E. observation at IX + 5° with movable thread.	1	36 22 26.72	...
16 41	70.7	...	...	6. Instrument in meridian, observation at IX with movable thread	2	25 46	...
16 46	70.5	...	...	9. Instrument in meridian, observation at I with movable thread	3	24 60	- 1.00
17 9	70.1	...	...		4	25 08	...
17 20	69.9	72.0	29.878		5	25 09	...
18 15 13	70.5	...	...		6	27 20	-15.75
15 45	70.5	78.7	29.898		7	26 00	-18.84
15 46	70.1	...	...		8	25 18	-18.03
16 10	75.5	...	...		9	26 68	...
16 21	75.4	...	...		10	26 98	-10.57
16 16	74.4	...	...		11	26 85	- 9.57
16 46	74.5	...	...		12	26 16	- 0.82
16 56	74.7	76.3	29.912		13	27 50	...
17 10	74.1	...	...	Notes	14	26 45	...
17 21	73.6	...	...	1. 12. Very faint.	15	26 42	-10.14
17 19	74.1	...	...	17. Clouds	16	25 70	-11.19
17 50	74.2	...	...		17	26 72	...
17 56	73.9	75.1	29.910		18	26 68	...
19 15 45	80.6	82.6	29.962		19	25 50	...
15 54	80.5	...	...		
16 11	79.9	...	...		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ε Ophiuchi	W	3	16 10 27.0	2 51.6	47.10	48.90	.....	353 0 0.98	+ 0.88	+18.14	- 51.58	-4 27 42.23
		E	...	16 16 7.0	2 48.4	47.60	49.35	.....	79 44 50.80	+ 1.31	-17.47	+ 51.61	
2	N Scorpii	E	4	16 22 36.0	2 36.6	47.60	49.05	.....	109 44 49.78	+ 1.16	- 8.95	+3 0.84	-34 30 0.38
		W	...	16 28 5.0	2 52.4	47.85	49.15	.....	322 59 57.38	+ 1.39	+10.84	-3 0.92	
3	24 Scorpii	W	3	16 33 31.0	2 35.2	47.00	48.65	.....	339 54 46.00	+ 0.65	+11.69	-1 22.38	-17 33 34.38
		E	...	16 38 47.0	2 40.8	47.50	49.00	.....	92 50 7.18	+ 1.06	-12.55	+1 22.41	
4	49 Herculis	E	3	16 45 10.0	2 35.9	47.55	48.80	.....	60 9 37.28	+ 1.05	-24.68	+ 24.15	+15 8 5.29
		W	...	16 50 34.0	2 48.1	48.00	49.45	.....	12 35 8.88	+ 1.58	+28.69	- 24.16	
5	d Herculis	W	2.5	16 58 ....	.....	47.70	48.75	26.560	31 8 36.88	+ 0.48	- 0.14	- 5.00	+33 42 29.05
		E	...	.....	.....	47.55	48.90	26.560	41 34 1.90	+ 0.45	+ 0.14	+ 5.00	
6	139 G. Scorpii	E	4	17 8 38.0	2 17.2	47.60	49.10	.....	107 48 28.92	+ 1.17	- 7.10	+2 41.62	-32 33 22.15
		W	...	17 13 28.0	2 32.8	48.90	50.20	.....	324 56 17.42	+ 2.39	+ 8.81	-2 41.70	
7	d Ophiuchi	W	4	17 18 38.0	2 41.5	48.05	49.50	.....	327 42 24.25	+ 1.61	+10.31	-2 19.51	-29 46 52.97
		E	...	17 24 1.0	2 41.5	47.50	48.95	.....	105 2 25.68	+ 1.04	-10.31	+2 19.57	
8	ξ Serpentis	E	3.5	17 29 24.0	2 46.4	47.50	48.90	.....	90 36 55.00	+ 1.04	-13.96	+1 16.17	-15 20 16.09
		W	...	17 34 41.0	2 30.6	48.60	49.95	.....	342 7 56.12	+ 2.19	+11.44	-1 16.17	
9	87 Herculis	W	2.5	17 42 44.5	2 14.0	47.20	48.70	.....	23 6 19.15	+ 0.76	+29.93	- 12.97	+25 39 27.22
		E	...	17 47 26.0	2 27.5	47.50	49.00	.....	49 38 38.02	+ 1.08	-36.26	+ 12.97	
10	67 Ophiuchi	E	3	17 53 14.5	2 39.9	47.25	48.65	.....	72 21 2.02	+ 0.79	-18.44	+ 39.89	+ 2 56 19.66
		W	...	17 58 31.5	2 37.1	48.40	49.65	.....	0 23 50.38	+ 1.92	+17.80	- 39.90	
11	24 Ursæ Minoris	W	2.5	18 3 0.0	2 46.9	48.00	49.45	.....	84 26 3.72	+ 1.53	- 0.83	+1 1.14	+86 59 55.85
		E	...	18 8 46.0	2 59.1	47.30	48.70	.....	348 18 46.58	+ 0.84	+ 0.96	-1 1.14	
12	446 B. Herculis	E	2.5	18 15 24.3	2 47.3	46.90	48.35	.....	52 3 41.65	+ 0.49	-40.36	+ 15.46	+23 14 26.45
	July 25, L.	W	...	18 20 50.7	2 39.1	48.50	49.75	.....	20 41 13.72	+ 2.00	+36.51	- 15.46	
13	μ Serpentis	E	2.5	15 42 12.0	2 28.4	49.35	48.25	.....	78 25 35.70	+ 0.86	-13.93	+ 49.68	- 3 8 28.84
		W	...	15 47 27.0	2 46.6	50.50	50.00	.....	354 19 11.05	+ 2.32	+17.56	- 49.70	
14	δ Scorpii	W	3	15 52 11.0	2 33.3	50.35	49.30	.....	335 7 23.18	+ 1.91	+10.51	-1 40.15	-22 21 15.12
		E	...	15 57 30.0	2 45.7	48.95	48.25	.....	97 37 30.55	+ 0.64	-12.29	+1 40.19	
15	ε Ophiuchi	E	3	16 10 47.0	2 31.6	48.95	48.35	.....	79 44 48.25	+ 0.66	-14.15	+ 52.07	- 4 27 43.08
		W	...	16 16 3.0	2 44.4	50.20	49.40	.....	353 0 0.80	+ 1.90	+16.65	- 52.08	
16	N Scorpii	W	4	16 22 32.0	2 40.6	49.35	48.45	.....	323 0 0.65	+ 0.97	+ 9.41	-3 2.55	-34 30 1.72
		E	...	16 28 2.0	2 49.4	48.70	47.65	.....	109 44 52.98	+ 0.19	-10.47	+3 2.61	
17	24 Scorpii	E	3	16 33 25.0	2 41.2	48.90	47.80	.....	92 50 8.60	+ 0.35	-12.61	+1 23.12	-17 33 34.42
		W	...	16 38 47.0	2 40.8	50.10	49.00	.....	339 54 46.18	+ 1.60	+12.55	-1 23.12	
18	49 Herculis	W	3	16 45 18.0	2 27.8	48.90	47.70	.....	12 35 18.88	+ 0.35	+22.19	- 24.35	+15 8 5.76
	July 26, L.	E	...	16 50 57.0	3 11.2	48.70	47.45	.....	60 9 51.58	+ 0.13	-37.12	+ 24.36	
19	σ Serpentis	W	2.5	16 14 32.0	2 44.3	47.95	46.70	.....	358 42 42.72	+ 0.47	+18.74	- 42.60	+ 1 15 6.88
		E	...	16 19 51.0	2 34.7	49.00	47.95	.....	74 2 11.35	+ 1.62	-16.62	+ 42.61	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
19 16 25	79.2	...	...	5. Instrument in meridian, observation at VIII with movable thread.	1	36 22 27.34	...
19 16 36	79.1	...	...		2	25.76	+ 1.96
19 16 48	78.6	...	...		3	27.03	- 3.09
19 16 54	...	80.3	29.972		4	26.40	...
19 17 1	78.5	...	...		5	27.64	...
19 17 11	78.1	...	...		6	25.76	- 1.70
19 17 21	77.6	...	...		7	26.32	...
19 17 32	77.1	...	...		8	26.36	...
19 17 38	...	79.0	29.973		9	26.34	-13.61
19 17 45	77.2	...	...		10	27.23	...
19 17 56	76.8	...	...		11	26.40	-14.87
19 18 6	77.0	...	...		12	27.00	-13.15
19 18 19	76.5	78.6	29.971		13	26.77	...
25 15 45	73.1	74.7	29.826		14	27.27	...
19 15 55	72.9	...	...		15	27.05	...
19 15 58	72.8	...	...		16	26.90	+ 2.41
19 16 14	72.9	...	...	Note.	17	28.34	- 3.11
19 16 25	72.2	...	...	18. Poor.	18	28.01	...
19 16 28	72.2	...	...		19	29.14	- 7.64
19 16 36	72.4	...	...		
19 16 48	72.1	...	...		
19 16 57	71.9	73.1	29.834				
19 16 17	72.1	74.1	29.822				
19 16 27	71.8	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	λ Ophiuchi	E W	2.5 ...	16 23 45.0 16 28 38.5	2 23.1 2 30.4	48.75 48.70	47.65 47.50	...	73 5 47.18 359 39 5.72	+ 1.42 + 1.29	-14.52 +16.04	+ 41.20 - 41.21	+ 2 11 29.98
2	20 Ophiuchi	W E	3 ...	16 41 51.0 16 47 32.5	2 45.0 2 56.5	47.55 48.60	46.60 47.65	...	346 51 6.02 85 53 52.40	+ 0.24 + 1.35	+14.02 -17.08	-1 4.73 +1 4.74	-10 36 55.78
3	d Herculis	E W	2 ...	16 58 .... .....	..... .....	48.65 49.00	47.55 47.70	26.398 26.398	41 34 6.98 31 8 44.10	+ 1.82 + 2.10	+ 0.14 - 0.14	+ 5.05 - 5.05	+33 42 30.21
4	139 G. Scorpii	W E	4 ...	17 8 20.0 17 13 36.0	2 35.2 2 40.8	47.90 48.65	46.85 47.55	...	324 56 23.58 107 48 32.90	+ 0.51 + 1.26	+ 9.08 - 9.75	-2 43.21 +2 43.26	-32 33 22.16
5	d Ophiuchi	E W	3.5 ...	17 18 34.0 17 23 54.0	2 45.4 2 34.6	48.55 49.25	47.45 48.00	...	105 2 27.22 327 42 28.98	+ 1.15 + 1.78	-10.81 + 9.45	+2 20.83 -2 20.88	-29 46 52.83
6	ξ Serpentis	W E	3.5 ...	17 29 28.0 17 34 26.0	2 42.4 2 15.6	48.50 48.80	47.30 47.45	...	342 7 58.45 90 36 52.30	+ 1.12 + 1.31	+13.30 - 9.27	-1 16.84 +1 16.84	-15 20 15.88
7	X Sagittarii	E W	3.5 ...	17 39 11.0 17 44 20.0	2 26.0 2 43.0	48.80 49.80	47.60 48.45	...	103 3 23.48 329 41 29.02	+ 1.40 + 2.36	- 8.71 +10.86	+2 7.90 -2 7.91	-27 47 38.17
8	ν Ophiuchi	W E	3 ...	17 50 57.0 17 56 32.0	2 52.3 2 42.7	49.10 48.90	47.90 47.50	...	347 42 21.85 85 2 32.52	+ 1.66 + 1.36	+16.53 -14.74	-1 3.01 +1 3.01	- 9 45 35.86
9	24 Ursæ Minoris	E W	2.5 ...	18 2 25.0 18 7 36.0	3 20.0 1 51.0	48.85 50.05	47.50 48.80	...	348 18 46.98 84 26 5.60	+ 1.34 + 2.58	+ 1.10 - 0.37	-1 1.69 +1 1.69	+86 59 57.54
10	446 B. Herculis	W E	2.5 ...	18 15 46.0 18 20 45.5	2 25.6 2 33.9	49.20 49.00	48.15 47.90	...	20 41 23.18 52 3 35.38	+ 1.89 + 1.66	+30.57 -34.16	- 15.59 + 15.60	+23 14 27.48
11	84 G. Sagittarii	E W	4 ...	18 30 6.0 18 35 30.0	2 40.2 2 43.8	49.15 50.60	48.00 49.15	...	98 51 6.68 333 53 45.48	+ 1.77 + 3.14	-11.25 +11.77	+1 46.14 -1 46.16	-23 34 57.86
12	204 B. Draconis	W E	2.5 ...	18 42 9.0 18 47 9.0	2 26.8 2 33.2	49.55 48.60	48.30 47.40	...	50 20 38.30 22 24 13.05	+ 2.10 + 1.13	-22.86 +24.89	+ 13.83 - 13.84	+52 53 19.77
13	July 28, L. 20 Ophiuchi	E W	3 ...	16 42 15.0 16 47 13.0	2 21.0 2 37.0	49.20 47.80	49.00 47.50	...	85 53 46.12 346 51 5.48	+ 3.91 + 2.39	-10.90 +13.51	+1 3.97 -1 3.99	-10 36 56.15
14	μ Herculis	W E	3 ...	17 14 .... .....	..... .....	45.90 49.40	45.60 49.25	26.497 26.497	30 38 34.42 42 4 12.58	- 0.16 + 3.48	- 0.14 + 0.14	- 5.48 + 5.48	+33 12 20.19
15	λ Draconis	E W	3 ...	17 27 35.0 17 33 21.0	2 42.7 3 3.3	48.40 48.00	48.15 47.80	...	20 2 25.50 52 42 36.52	+ 2.99 + 2.61	+22.76 -28.88	- 16.05 + 16.05	+55 15 12.26
16	γ Ophiuchi	W E	3 ...	17 40 39.0 17 46 7.5	2 29.9 2 58.6	46.85 48.35	46.60 48.10	...	0 12 19.98 72 32 44.88	+ 1.40 + 2.96	+16.14 -22.90	- 40.02 + 40.04	+ 2 44 42.97
17	ν Ophiuchi	E W	3.5 ...	17 51 17.0 17 56 27.0	2 32.4 2 37.6	48.35 47.95	48.10 47.90	...	85 2 31.20 347 42 23.88	+ 2.95 + 2.63	-12.93 +13.83	+1 2.10 -1 2.19	- 9 45 35.92
18	102 Herculis	W E	3 ...	18 2 2.0 18 7 31.0	2 40.4 2 48.6	47.30 48.55	46.85 48.85	...	18 15 9.30 54 29 49.62	+ 1.80 + 3.50	+32.81 -30.25	- 17.94 + 17.94	+20 48 12.29
19	447 B. Herculis	E W	3 ...	18 16 3.0 18 21 23.7	2 34.9 2 44.8	48.50 49.00	48.10 48.90	...	57 30 50.80 15 13 58.95	+ 3.05 + 3.77	-26.88 +30.42	+ 21.19 - 21.20	+17 46 58.60
20	84 G. Sagittarii	W E	3.5 ...	18 30 9.0 18 35 35.0	2 37.2 2 48.8	47.80 48.65	47.45 48.30	...	333 53 45.65 98 51 10.30	+ 2.40 + 3.24	+10.83 -12.49	-1 44.77 +1 44.77	-23 34 59.15

Time.	Ther- 3882	At- ther.	Barom	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1900.0.
<i>d h m</i>	<i>"</i>	<i>"</i>	<i>in</i>					<i>° ' "</i>	<i>"</i>
16 16 29	71.8		29.816	3 Instrument in meridian, observation at II with movable thread.			1	16 22 28.06	...
16 45	71.4		29.828	14 Instrument in meridian, observation at VIII with movable thread.			2	28 23	...
16 57	71.2	71.4	29.828				3	28 52	...
17 11	70.8		29.828				4	28.82	- 1.15
17 23	70.6		29.828				5	28.86	...
17 33	70.3		29.828				6	28.80	...
17 42	70.2		29.828				7	29.20	- 4.28
17 51	70.1	71.8	29.816				8	29.09	...
18 10	70.0		29.816				9	28.06	-16.53
18 18	69.8		29.816				10	29.36	-14.40
18 31	69.6		29.816				11	28.78	- 8.17
18 35	69.5		29.816				12	28.10	-15.54
18 45	69.1	71.4	29.840				13	30.24	...
18 10 45	76.6		29.840				14	30.17	-16.57
18 11	76.1	71.4	29.840				15	30.75	-18.64
18 12	76.0		29.840				16	31.24	-11.05
18 20	76.0		29.840				17	30.28	...
18 44	76.6		29.840				18	30.40	-14.53
18 54	76.8	71.4	29.840				19	30.05	-14.16
18 55	76.5		29.840				20	29.96	- 8.10
18 56	76.1		29.840						

Notes.
4. Very faint.
16. Faint clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	204 B. Draconis	E	2.5	18 41 47.0	2 48.9	48.50	48.25	.....	22 24 8.02	+ 3.09	+30.26	- 13.64	+52 53 20.01
	August 4, L.	W	...	18 47 19.0	2 43.1	49.10	48.65	.....	50 20 45.30	+ 3.62	-28.21	+ 13.63	
2	ε Scorpil	W	3.5	16 41 27.0	2 35.9	48.75	48.70	.....	323 22 40.45	+ 1.36	+ 8.92	-2 56.85	-34 7 21.46
		E	...	16 46 46.0	2 43.1	49.40	49.60	.....	109 22 21.05	+ 2.14	- 9.77	+2 56.81	
3	μ Herculis	E	2.5	17 14 ....	...	48.85	49.05	26.549	42 4 11.95	+ 2.29	+ 0.22	+ 5.49	+33 12 20.48
		W	...	...	...	50.40	50.00	26.549	30 38 29.58	+ 3.59	- 0.22	- 5.49	
4	ν ² Draconis	W	2.5	17 27 39.0	2 44.1	49.65	49.85	.....	52 41 51.92	+ 2.46	-23.17	+ 16.07	+55 14 32.45
		E	...	17 33 8.0	2 44.9	48.05	47.95	.....	20 3 7.85	+ 0.64	+23.40	- 16.07	
5	X Sagittarii	W	3.5	17 38 51.0	2 46.3	50.90	50.75	.....	329 41 27.50	+ 3.55	+11.30	-2 6.50	-27 47 38.96
		E	...	17 44 30.0	2 52.7	47.80	47.95	.....	103 3 32.32	+ 0.53	-12.19	+2 6.55	
6	θ Herculis	E	2.5	17 53 ....	...	49.00	48.70	26.513	38 0 33.30	+ 2.22	+ 0.25	+ 1.58	+37 16 3.25
		W	...	...	...	50.90	50.40	26.513	34 42 8.20	+ 4.04	- 0.25	- 1.58	
7	102 Herculis	E	2.5	18 2 5.5	2 37.1	49.20	49.25	.....	54 29 45.35	+ 1.92	-31.48	+ 17.99	+20 48 13.62
		W	...	18 7 38.5	2 55.9	50.25	49.85	.....	18 15 3.38	+ 2.74	+39.46	- 18.01	
8	10 Vulpeculæ	W	3	19 37 46.0	2 1.1	48.40	47.60	.....	23 2 5.55	+ 0.60	+24.28	- 13.16	+25 33 3.50
	August 6, L.	E	...	19 42 3.5	2 16.4	50.50	49.85	.....	49 45 0.05	+ 2.87	-30.80	+ 13.16	
9	ε Scorpil	E	4	16 41 21.0	2 41.9	49.15	48.65	.....	109 22 22.42	+ 0.19	- 9.62	+2 56.39	-34 7 23.00
		W	...	16 46 35.0	2 32.1	51.30	50.70	.....	323 22 35.62	+ 2.35	+ 8.50	-2 56.54	
10	30 Ophiuchi	W	2.5	16 53 27.0	2 37.4	49.50	48.90	.....	353 23 2.92	+ 0.53	+15.37	- 50.92	- 4 4 45.73
		E	...	16 58 42.0	2 37.6	50.05	49.60	.....	79 21 56.10	+ 1.20	-15.41	+ 50.91	
11	θ Ophiuchi	E	4	17 13 48.0	2 24.7	50.05	49.55	.....	100 10 21.55	+ 1.11	- 8.98	+1 50.58	-24 54 18.28
		W	...	17 19 21.0	3 8.3	50.45	49.95	.....	332 34 28.12	+ 1.53	+15.21	-1 50.61	
12	ν ² Draconis	E	3	17 27 33.0	2 50.0	49.80	49.55	.....	20 3 4.48	+ 1.01	+24.87	- 16.02	+55 14 32.60
		W	...	17 33 8.0	2 45.0	51.25	50.70	.....	52 41 51.15	+ 2.37	-23.43	+ 16.02	
13	γ Ophiuchi	E	2.5	17 40 27.5	2 41.5	50.15	49.75	.....	72 32 40.92	+ 1.28	-18.73	+ 39.96	+ 2 44 44.08
		W	...	17 45 43.5	2 34.5	51.50	50.90	.....	0 12 18.45	+ 2.54	+17.14	- 39.97	
14	θ Herculis	W	2	17 53 ....	...	51.30	50.45	26.647	34 42 7.08	+ 1.47	- 0.25	- 1.58	+37 16 3.50
		E	...	...	...	50.10	49.70	26.647	38 0 30.85	+ 0.49	+ 0.25	+ 1.58	
15	μ Sagittarii	E	3.5	18 5 27.0	2 40.1	50.65	50.00	.....	96 21 16.52	+ 1.69	-11.72	+1 34.26	-21 4 54.04
		W	...	18 10 49.0	2 41.9	52.10	51.45	.....	336 23 38.32	+ 3.19	+11.98	-1 34.27	
16	447 B. Herculis	W	3	18 16 4.0	2 34.1	50.95	50.15	.....	15 14 5.30	+ 1.87	+26.60	- 21.14	+17 46 59.54
		E	...	18 21 21.0	2 42.9	50.70	50.20	.....	57 30 53.78	+ 1.80	-29.73	+ 21.14	
17	3 H. Scuti	E	3	18 27 26.0	2 38.1	50.75	50.15	.....	83 35 25.88	+ 1.81	-14.30	+ 59.02	- 8 18 25.78
	August 15, L.	W	...	18 32 41.0	2 36.9	52.30	51.75	.....	349 9 28.90	+ 3.44	+14.08	- 59.02	
18	30 Ophiuchi	E	3	16 53 19.0	2 45.3	50.50	49.80	.....	79 21 57.05	+ 1.35	-16.96	+ 50.77	- 4 4 45.62
		W	...	16 59 41.0	3 36.7	50.80	49.75	.....	353 22 47.70	+ 1.44	+29.14	- 50.78	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
28 18 45	75.5	76.8	29.775	3.6. Instrument in meridian, observation at I with movable thread.	1	36 22 31.04	-16.16
4 16 44	78.6	...	...	8. Instrument in meridian; W. observation assumed to be on movable thread at 22.000 rev.	2	32.06	...
16 47	78.7	80.1	29.944	14. Instrument in meridian, observation at IX with movable thread.	3	31.04	-17.53
16 56	78.2	...	...		4	31.55	-20.08
17 12	78.2	...	...		5	31.53	- 3.99
17 31	77.9	...	...		6	29.75	...
17 42	77.6	79.0	29.947		7	30.68	-15.71
17 54	77.2	...	...		8	32.06	-15.65
18 5	76.6	...	...		9	29.66	...
18 20	76.2	...	...		10	30.35	...
18 43	...	77.2	29.956		11	29.26	...
19 40	73.5	74.9	29.946		12	30.22	-20.40
6 16 40	80.3	...	...		13	30.80	-11.80
16 49	79.5	...	...		14	31.28	...
16 56	80.0	...	...		15	29.98	...
17 1	...	81.3	29.963		16	29.81	-15.57
17 14	79.7	...	...		17	29.90	...
17 22	79.6	...	...		18	29.86	...
17 30	79.6	...	...		
17 43	79.6	...	...		
17 51	79.9	80.8	29.968	Note.			
18 8	80.1	...	...	8, 12, 16, 17, 18. Clouds.			
18 19	79.9	...	...		
18 30	79.8	...	...		
18 45	...	80.3	29.971				
15 16 55	77.4	79.4	29.743				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle..	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Hercules (brighter)	W E	3	17 20 .....	.....	49. 60 50. 40	48. 80 49. 30	26. 274 26. 274	34 40 34.75 38 2 34.68	- 0.41 + 0.26	- 0.25 + 0.25	- 1.61 + 1.61	+37 14 14.58
2	μ Hercules	E W	2.5	17 40 14.3 17 45 17.5	2 30.5 2 32.7	50. 65 51. 20	49. 40 49. 80	..... .....	47 31 28.48 25 13 26.35	+ 1.21 + 1.70	-44.00 +45.29	+ 10.77 - 10.78	+27 46 49.79
3	τ Ophiuchi (mean)	W E	2.5	17 55 7.5 18 0 44.0	2 48.8 2 47.7	49. 85 50. 75	48. 50 49. 55	..... .....	349 17 16.55 83 27 41.60	+ 0.33 + 1.35	+16.34 -16.12	- 58.75 + 58.78	- 8 10 38.83
4	μ Sagittarii	W E	3	18 5 32.0 18 10 52.5	2 35.1 2 45.4	50. 80 50. 60	49. 55 49. 60	..... .....	336 23 41.80 96 21 17.50	+ 1.38 + 1.27	+11.00 -12.51	-1 34.39 +1 34.42	-21 4 53.70
5	ϵ Sagittarii	E W	3.5	18 15 12.0 18 20 42.0	2 42.9 2 47.1	50. 70 51. 70	49. 60 50. 70	..... .....	109 40 35.90 323 4 20.72	+ 1.31 + 2.36	- 9.69 +10.20	+3 0.14 -3 0.17	-34 25 40.54
6	3 H. Scuti	W E	2.5	18 27 23.0 18 32 42.0	2 41.0 2 38.0	50. 80 50. 80	49. 75 49. 75	..... .....	349 9 31.35 83 35 25.85	+ 1.47 + 1.47	+14.83 -14.28	- 59.12 + 59.13	- 8 18 25.08
7	6 H. Scuti	E W	3	18 39 29.0 18 45 4.0	2 40.7 2 54.3	50. 70 52. 40	49. 25 50. 85	..... .....	80 7 50.88 352 37 0.92	+ 1.19 + 2.83	-15.79 +18.57	+ 52.42 - 52.43	- 4 50 42.66
8	ϵ Aquilæ	W E	2.5	18 52 34.0 18 58 6.0	2 45.8 2 46.2	51. 35 51. 30	50. 10 50. 05	..... .....	12 23 50.00 60 21 7.35	+ 1.95 + 1.87	+27.73 -27.87	- 24.38 + 24.40	+14 56 41.52
9	21 Aquilæ	E W	3	19 6 15.0 19 11 37.0	2 41.9 2 40.1	51. 10 53. 10	49. 60 51. 80	..... .....	73 9 7.02 359 35 48.38	+ 1.54 + 3.72	-18.56 +18.15	+ 40.99 - 41.00	+ 2 8 15.87
10	b Aquilæ	W E	3	19 17 40.0 19 23 19.0	2 47.9 2 51.1	52. 20 51. 20	50. 85 50. 15	..... .....	9 12 5.05 63 32 52.85	+ 2.78 + 1.86	+25.64 -26.63	- 28.18 + 28.18	+11 44 51.26
11	κ Aquilæ	E W	2.5	19 29 7.0 19 34 32.0	2 41.8 2 43.2	51. 15 53. 85	50. 00 52. 40	..... .....	82 31 1.78 350 13 52.35	+ 1.75 + 4.41	-15.28 +15.55	+ 57.08 - 57.10	- 7 13 58.32
12	f Sagittarii	W E	3	19 39 5.0 19 43 3.0	1 46.6 2 11.4	53. 00 51. 00	51. 85 49. 95	..... .....	337 29 32.32 95 15 24.60	+ 3.67 + 1.07	+ 5.29 - 8.04	-1 30.72 +1 30.74	-19 59 2.46
13	August 16, L. 117 G. Scorpii	E W	3	19 54 58.0 19 58 36.0	0 48.2 2 49.8	53. 25 53. 65	51. 95 52. 40	..... .....	107 15 20.60 325 29 19.52	+ 4.31 + 4.74	- 0.89 +10.98	+2 37.00 -2 37.02	-32 0 14.66
14	θ Ophiuchi	W E	3	17 13 30.0 17 18 40.0	2 42.5 2 27.5	52. 65 52. 85	51. 55 51. 95	..... .....	332 34 31.85 100 10 18.68	+ 3.78 + 4.08	+11.32 - 9.33	-1 51.15 +1 51.16	-24 54 17.66
15	2 H. Scuti	E W	3	18 21 4.0 18 26 27.0	2 45.1 2 37.9	53. 10 51. 50	52. 00 50. 50	..... .....	89 54 6.98 342 50 49.35	+ 4.22 + 2.65	-13.91 +12.73	+1 14.37 -1 14.39	-14 37 23.92
16	6 H. Scuti	W E	2.5	18 39 52.0 18 44 44.5	2 17.7 2 34.8	49. 45 53. 00	48. 40 52. 05	..... .....	352 37 11.75 80 7 47.38	+ 0.54 + 4.24	+11.50 -14.65	- 52.07 + 52.07	- 4 50 42.48
17	ϵ Aquilæ	E W	2.5	18 52 36.5 18 58 3.5	2 43.3 2 43.7	51. 75 52. 10	50. 65 50. 95	..... .....	60 21 5.00 12 23 50.00	+ 2.87 + 3.22	-26.90 +27.03	+ 24.50 - 24.52	+14 56 41.87
18	δ Cygni	W E	2	19 42 .....	.....	51. 50 51. 30	50. 10 50. 10	27.795 27.795	42 19 32.20 30 21 29.90	+ 1.88 + 1.78	- 0.22 + 0.22	+ 5.79 - 5.79	+44 54 23.51
19	August 17, L. 30 Ophiuchi	E W	3	16 53 13.0 16 58 42.0	2 51.2 2 37.8	52. 00 51. 25	50. 65 49. 90	..... .....	79 21 56.92 353 23 2.40	+ 2.00 + 1.20	-18.19 +15.45	+ 51.61 - 51.58	- 4 4 45.70

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
15 17 19	26.8			1. Instrument in meridian, observation at IX with movable thread.	1	16 22 30.96	-19.85
17 43	26.1			18. Instrument in meridian, observation at VIII with movable thread.	2	29.51	
17 57	25.9	77.4	29.746		3	30.04	-10.15
18 8	25.4				4	30.24	
18 18	25.1				5	30.38	
18 40	25.1				6	30.35	
18 42	24.8				7	29.30	-12.65
18 55	24.5	76.1	29.747		8	30.52	
19 9	24.1				9	30.12	-14.80
19 20	23.9				10	30.74	
19 32	23.8				11	30.27	
19 40	23.5	75.6	29.751		12	29.76	-11.95
19 55	25.1				13	29.62	+ 0.34
17 1	25.2	76.8	29.848		14	30.20	
17 16	25.1				15	31.00	
17 19	25.1				16	30.43	-12.69
18 22	24.1	75.7	29.856	1. Poor.	17	30.60	
18 29	24.0			14. 18. Clouds.	18	31.10	
18 42	24.4			16 E. One microscope reading increased 20".	19	29.90	
18 53	24.0						
19 41	22.8	74.4	29.871				
19 52	23.3	75.1	29.960				
19 59	23.5						

No.	Date, observer, and object.	Circle.	See-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid-ian.	Refrac-tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ρ Herculis (<i>brighter</i>)	E	2.5	17 20 ....	....	52.10	51.20	26.121	38 2 37.05	+ 2.87	+ 0.16	+ 1.63	+37 14 15.44
		W	...	....	....	51.20	50.00	26.121	34 40 39.08	+ 1.81	- 0.16	- 1.63	
2	μ Herculis	W	2.5	17 40 10.3	2 34.4	50.45	49.30	.....	25 13 27.75	+ 0.50	+46.30	- 10.95	+27 46 49.56
		E	...	17 45 25.7	2 41.0	52.50	51.65	.....	47 31 34.60	+ 2.75	-50.34	+ 10.95	
3	36 Draconis	E	3	18 11 9.0	2 10.8	53.00	51.65	.....	10 55 46.08	+ 3.02	+ 7.31	- 26.45	+64 22 16.91
	August 22, L.	W	...	18 15 50.0	2 30.2	54.70	53.40	.....	61 49 8.72	+ 4.76	- 9.64	+ 26.46	
4	" Herculis	E	2	17 14 ....	....	50.40	49.90	26.423	42 4 11.42	+ 1.15	+ 0.22	+ 5.43	+33 12 22.74
	August 23, L.	W	...	....	....	50.70	50.15	26.423	30 38 34.40	+ 1.45	- 0.22	- 5.43	
5	168 H ¹ . Herculis	W	2.5	17 49 ....	....	48.50	48.20	26.637	37 26 30.62	- 0.05	- 0.18	+ 1.03	+40 0 29.75
		E	...	....	....	50.35	50.05	26.637	35 16 4.45	+ 1.83	+ 0.18	- 1.03	
6	τ Ophiuchi (<i>mean</i>)	E	3	17 55 6.5	2 49.7	49.60	49.30	.....	83 27 41.32	+ 1.69	-16.51	+ 58.41	- 8 10 39.21
		W	...	18 1 20.0	3 23.8	49.00	48.60	.....	349 17 6.58	+ 1.01	+23.81	- 58.42	
7	36 Draconis	W	2.5	18 10 38.0	2 41.4	48.20	47.90	.....	61 49 16.32	+ 0.24	-11.12	+ 25.88	+64 22 18.15
		E	...	18 16 11.0	2 51.6	49.50	49.40	.....	10 55 40.15	+ 1.68	+12.58	- 25.88	
8	c Serpentis	E	2.5	18 22 4.0	2 41.8	49.35	49.30	.....	77 19 47.80	+ 1.56	-16.94	+ 47.17	- 2 2 33.25
		W	...	18 27 27.0	2 41.2	48.95	48.50	.....	355 25 9.02	+ 0.94	+16.81	- 47.17	
9	110 Herculis	W	2.5	18 39 7.0	2 28.2	47.95	47.55	.....	17 54 43.52	- 0.09	+27.57	- 18.17	+20 27 39.08
		E	...	18 44 34.0	2 58.8	49.95	49.55	.....	54 50 28.15	+ 1.97	-40.13	+ 18.18	
10	θ Serpentis	E	2.5	18 49 13.0	2 18.2	49.80	49.40	.....	71 12 14.85	+ 1.80	-14.15	+ 37.86	+ 4 5 7.15
		W	...	18 54 14.5	2 43.3	49.75	49.45	.....	1 32 37.48	+ 1.81	+19.76	- 37.88	
11	21 Aquilæ	W	3	19 6 4.0	2 52.8	48.55	48.10	.....	359 35 48.95	+ 0.55	+21.14	- 40.60	+ 2 8 16.25
		E	...	19 11 53.0	2 56.2	49.85	49.55	.....	73 9 10.30	+ 1.94	-21.98	+ 40.69	
12	b Aquilæ	E	2.5	19 17 44.5	2 43.3	49.70	49.50	.....	63 32 49.22	+ 1.82	-24.26	+ 27.96	+11 44 52.21
		W	...	19 23 12.5	2 44.7	49.35	48.95	.....	9 12 7.62	+ 1.33	+24.68	- 27.96	
13	κ Aquilæ	W	3	19 29 5.0	2 43.7	49.00	48.70	.....	350 13 55.02	+ 1.08	+15.64	- 56.64	- 7 13 58.25
		E	...	19 34 28.0	2 39.3	49.75	49.55	.....	82 31 1.40	+ 1.87	-14.81	+ 56.64	
14	f Sagittarii	E	3.5	19 38 30.0	2 21.6	49.75	49.35	.....	95 15 28.50	+ 1.79	- 9.34	+1 29.96	-19 59 4.13
	September 4, L.	W	...	19 43 27.0	2 35.4	49.70	49.15	.....	337 29 26.18	+ 1.67	+11.25	-1 29.96	
15	168 H ¹ . Herculis	E	2	17 49 ....	....	48.20	49.25	26.693	35 15 54.98	+ 2.11	+ 0.18	- 1.06	+40 0 30.23
		W	...	....	....	....	....	26.693	37 26 20.82	+ 1.42	- 0.18	+ 1.06	
16	γ Sagittarii	W	4	17 57 10.0	2 34.8	47.35	48.15	.....	327 3 55.02	+ 0.55	+ 9.37	-2 26.80	-30 25 27.36
		E	...	18 2 15.0	2 30.2	48.10	48.75	.....	105 40 47.08	+ 1.23	- 8.82	+2 26.91	
17	2 H. Scuti	W	3	18 21 24.0	2 25.1	47.65	48.20	.....	342 50 46.95	+ 0.73	+10.75	-1 15.60	-14 37 23.85
		E	...	18 27 15.0	3 25.9	47.15	47.70	.....	89 54 9.88	+ 0.21	-21.64	+1 15.61	
18	δ Sagittæ	E	3	19 40 37.0	2 33.5	47.25	47.50	.....	56 59 16.40	+ 0.18	-26.96	+ 21.16	+18 18 27.71
		W	...	19 46 1.0	2 50.5	48.65	48.85	.....	15 45 18.98	+ 1.58	+33.27	- 21.17	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
17 17 19	72.4	....	....	1, 15. Instrument in meridian, observation at II with movable thread.	1	36 22 30.46	-20.06
17 43	72.2	....	....	4. Instrument in meridian, observation at I with movable thread.	2	30.78	....
17 50	72.4	73.4	29.982	5. Instrument in meridian, observation at VIII with movable thread.	3	30.13	-22.29
18 14	71.5	....	....		4	26.60	-19.58
18 22	71.5	73.1	29.992		5	29.56	-21.41
22 17 12	79.6	81.4	29.698		6	28.94	-10.22
23 17 42	78.2	79.6	29.706		7	29.92	-23.24
17 58	78.1	....	....		8	29.60	-12.97
18 14	77.9	....	....		9	30.50	....
18 26	77.9	....	....		10	30.76	....
18 42	77.9	78.9	29.710		11	30.45	-15.26
18 52	77.5	....	....		12	30.90	....
19 9	77.3	....	....		13	30.10	....
19 21	77.2	....	....		14	30.02	-11.57
19 33	77.2	....	....	Notes.	15	23.08	-22.54
19 41	77.2	78.7	29.708	2, 17. Clouds.	16	22.27	....
4 17 51	68.6	70.7	29.928	5. 6. Very faint.	17	23.44	....
18 0	67.5	....	....	15 W. Level correction assumed.	18	21.72	....
18 11	67.5	....	....		
18 25	67.2	....	....		
18 40	....	69.3	29.934				
19 43	65.3	67.7	29.954				
19 57	64.6	....	....		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	63 Sagittarii	W	3	19 54 2.0	2 39.7	47.55	47.85	.....	343 34 28.75	+ 0.50	+13.19	-1 14.06	-13 53 37.84
		E	...	19 59 35.0	2 53.3	47.30	47.75	.....	89 10 18.78	+ 0.31	-15.53	+1 14.04	
2	20 Vulpeculæ	E	3	20 5 20.0	2 43.0	47.25	47.50	.....	49 5 58.15	+ 0.16	-45.94	+ 12.71	+26 12 13.30
		W	...	20 10 44.3	2 41.3	48.90	49.20	.....	23 38 43.98	+ 1.88	+44.99	- 12.71	
3	π Capricorni	W	3	20 19 2.0	2 53.6	48.00	48.20	.....	338 57 19.52	+ 0.92	+14.39	-1 27.89	-18 30 58.83
		E	...	20 24 27.0	2 31.4	47.15	47.75	.....	93 47 20.92	+ 0.25	-10.94	+1 27.92	
4	29 Vulpeculæ	E	3	20 31 28.0	2 50.2	47.30	47.55	.....	54 25 22.40	+ 0.23	-37.07	+ 18.37	+20 52 35.26
		W	...	20 36 51.5	2 33.3	49.60	49.90	.....	18 19 26.60	+ 2.61	+30.07	- 18.37	
5	September 5, L. 168 H ¹ . Herculis	E	2	17 49 ....	.....	50.30	51.05	26.673	35 15 59.08	+ 1.04	+ 0.18	- 1.07	+40 0 30.57
		W	...	.....	.....	51.20	51.85	26.673	37 26 24.02	+ 1.92	- 0.18	+ 1.07	
6	γ Sagittarii	E	3	17 57 3.0	2 41.8	50.40	50.80	.....	105 40 52.32	+ 0.41	-10.24	+2 27.94	-30 25 28.27
		W	...	18 2 32.0	2 47.2	51.40	52.00	.....	327 3 55.90	+ 1.55	+10.93	-2 28.03	
7	5 B. Lyrae	W	2.5	18 13 ....	.....	50.50	51.20	27.355	39 33 26.05	+ 0.09	- 0.19	+ 3.17	+42 8 0.55
		E	...	.....	.....	50.00	50.65	27.355	33 8 5.02	- 0.48	+ 0.19	- 3.17	
8	ε Serpentes	W	2.5	18 22 3.0	2 42.9	50.85	51.55	.....	355 25 7.78	+ 1.01	+17.17	- 48.99	- 2 2 32.47
		E	3	18 27 30.0	2 44.1	50.00	50.90	.....	77 19 43.60	+ 0.26	-17.42	+ 49.00	
9	110 Herculis	E	2.5	18 39 3.0	2 32.3	50.45	51.10	.....	54 50 10.30	+ 0.56	-29.11	+ 18.88	+20 27 41.07
		W	...	18 44 24.0	2 48.7	51.85	52.25	.....	17 54 30.50	+ 1.88	+35.73	- 18.89	
10	θ Serpentes	W	3	18 48 48.0	2 43.3	51.05	51.65	.....	1 32 35.85	+ 1.16	+19.76	- 39.33	+ 4 5 7.63
		E	...	18 54 19.0	2 47.7	50.35	50.95	.....	71 12 16.75	+ 0.44	-20.84	+ 39.36	
11	17 Lyrae	E	3	19 4 ....	.....	50.45	50.95	25.820	42 55 24.62	+ 1.24	+ 0.21	+ 6.51	+32 21 32.73
		W	...	.....	.....	51.95	52.25	25.820	29 48 8.58	+ 2.65	- 0.21	- 6.51	
12	d Sagittarii	W	3	19 10 22.0	1 45.0	50.90	51.45	.....	338 21 29.60	+ 1.00	+ 5.21	-1 30.50	-19 7 3.81
		E	...	19 14 21.0	2 14.0	50.20	50.60	.....	94 23 24.22	+ 0.21	- 8.49	+1 30.53	
13	186 G. Sagittarii	E	3.5	19 18 5.0	2 54.1	50.50	50.90	.....	105 11 6.92	+ 0.51	-11.95	+2 25.14	-20 55 37.91
		W	...	19 23 44.0	2 44.9	51.55	51.95	.....	327 33 44.12	+ 1.59	+10.72	-2 25.16	
14	ε Sagittæ	W	3	19 30 22.0	2 38.8	50.95	51.25	.....	13 42 30.60	+ 0.91	+26.66	- 23.69	+16 15 25.01
		E	...	19 35 50.7	2 49.9	50.35	50.80	.....	59 2 24.45	+ 0.37	-30.51	+ 23.69	
15	δ Sagittæ	W	3	19 40 29.0	2 41.5	51.80	52.00	.....	15 45 27.18	+ 1.75	+29.85	- 21.34	+18 18 27.81
		E	...	19 46 4.0	2 53.5	50.55	50.95	.....	56 59 27.90	+ 0.57	-34.44	+ 21.34	
16	63 Sagittarii	E	3.5	19 53 54.0	2 47.7	50.85	51.00	.....	89 10 20.02	+ 0.73	-14.54	+1 14.63	-13 53 38.01
		W	...	19 59 29.0	2 47.3	52.60	52.65	.....	343 34 28.98	+ 2.47	+14.47	-1 14.64	
17	20 Vulpeculæ	W	2.5	20 5 30.7	2 32.3	51.45	51.60	.....	23 38 52.55	+ 1.36	+40.11	- 12.83	+26 12 12.97
		E	...	20 10 43.0	2 40.0	50.60	50.90	.....	49 5 59.68	+ 0.54	-44.27	+ 12.83	
18	296 G. Sagittarii	E	4	20 17 0.0	2 40.7	50.75	51.05	.....	104 13 29.30	+ 0.72	-10.35	+2 18.60	-28 57 55.55
		W	...	20 22 34.0	2 53.3	53.35	53.35	.....	328 31 17.00	+ 3.23	+12.03	-2 18.62	
19	γ Delphini	W	3.5	20 28 6.0	2 47.8	52.20	52.35	.....	11 48 22.10	+ 2.11	+27.84	- 25.97	+14 21 17.85
		E	...	20 33 37.0	2 43.2	50.90	51.20	.....	60 56 23.42	+ 0.86	-26.34	+ 25.97	
20	September 6, L. Draconis	E	2.5	17 49 2.0	2 50.0	49.35	49.60	.....	18 23 58.22	+ 0.64	+21.70	- 18.03	+56 53 38.07
		W	...	17 54 39.0	2 47.0	50.00	50.35	.....	54 20 46.70	+ 1.34	-20.95	+ 18.05	

Time	Ther. 3502	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point	Red. to 1906.0.
<i>d h m s</i>	<i>"</i>	<i>"</i>	<i>mm</i>			<i>° ' "</i>	<i>"</i>
4 25 8	60.3	...	...	Instrument in meridian, observation at II with movable thread.	1	16 22 22.99	-13.16
20 22	60.5	...	...	Instrument in meridian, observation at VIII with movable thread.	2	21.01	-21.15
20 34	60.3	60.3	29.992	Instrument in meridian, observation at I with movable thread.	3	22.54	...
5 17 44	60.5	60.7	30.022		4	22.42	-20.75
18 0	50.5	...	...		5	25.64	-22.61
18 10	61.9	...	...		6	25.19	...
18 20	61.2	...	...		7	25.80	21.18
18 12	61.2	60.4	30.010		8	26.20	-13.42
18 11	61.6	...	...		9	24.91	...
19 2	61.1	...	...		10	26.08	...
19 11	62.5	...	...		11	26.12	-22.18
19 21	62.9	...	...		12	25.89	...
19 13	62.2	...	...		13	25.94	7.19
19 12	...	60.1	30.042	Notes	14	26.24	19.68
19 43	62.5	...	...	Very faint, clouds	15	26.40	...
19 16	62.2	...	...	W. One microscope reading increased 20"	16	26.66	-11.11
20 8	61.7	...	...		17	24.98	-21.10
20 19	61.5	...	...		18	25.96	-16.01
20 11	61.5	61.2	30.041		19	23.00	-19.07
6 17 52	59.1	71.9	29.990		20	21.84	...

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	♂ Ursæ Minoris	W E	2.5 ...	18 0 2.0 18 5 6.0	2 29.1 2 34.9	49.65 49.15	50.00 49.70	..... .....	84 3 18.38 348 41 27.42	+ 1.00 + 0.58	- 0.75 + 0.81	+1 1.08 -1 1.11	+86 37 12.77
2	5 B. Lyrae	E W	... ...	18 13 .... .....	..... .....	49.00 49.65	49.65 50.00	27.278 27.278	33 8 5.85 39 33 25.70	+ 1.04 + 1.73	+ 0.19 - 0.19	- 3.13 + 3.13	+42 7 59.98
3	2 H. Scuti	W E	2.5 ...	18 21 9.0 18 26 31.5	2 40.2 2 42.3	48.65 48.80	49.30 49.45	..... .....	342 50 44.82 89 54 2.68	+ 0.12 + 0.26	+13.10 -13.45	-1 15.30 +1 15.32	-14 37 24.27
4	153 H ¹ . Draconis	E W	3.5 ...	18 33 20.0 18 39 32.0	2 33.8 3 38.2	48.85 49.60	49.40 50.10	..... .....	9 53 18.45 62 51 38.28	+ 0.28 + 1.02	+ 9.36 -18.85	- 27.78 + 27.79	+65 24 40.73
5	0 Draconis	W E	2.5 ...	18 47 8.0 18 52 37.0	2 39.4 2 49.6	49.05 48.65	49.50 49.25	..... .....	56 43 50.00 16 0 55.10	+ 0.44 + 0.09	-15.83 +17.92	+ 20.71 - 20.72	+59 16 48.23
6	17 Lyrae	W E	2 ...	19 4 .... .....	..... .....	49.45 48.90	50.15 49.35	25.841 25.841	29 48 8.35 42 55 22.35	+ 0.22 - 0.45	- 0.21 + 0.21	- 6.43 + 6.43	+32 21 33.47
7	d Sagittarii	E W	2.5 ...	19 10 26.0 19 14 38.0	1 41.1 2 30.9	48.85 50.35	49.50 51.05	..... .....	94 23 20.32 338 21 20.15	+ 0.33 + 1.89	- 4.83 +10.76	+1 29.24 -1 29.25	-19 7 3.99
8	21 B. Vulpeculæ	W E	2.5 ...	19 19 4.3 19 23 55.0	2 26.8 2 23.9	50.00 49.10	51.00 50.00	..... .....	22 11 40.62 50 33 4.10	+ 1.68 + 0.70	+33.91 -32.58	- 14.12 + 14.13	+24 44 54.64
9	ε Sagittæ	E W	2.5 ...	19 30 16.5 19 35 40.0	2 44.4 2 39.1	49.05 50.45	49.85 51.10	..... .....	59 2 21.22 13 42 26.82	+ 0.59 + 1.96	-28.57 +26.76	+ 23.36 - 23.37	+16 15 24.55
10	ζ Sagittæ	W E	2.5 ...	19 42 3.5 19 47 36.0	2 43.7 2 48.8	50.00 49.25	50.80 50.20	..... .....	16 21 36.82 56 23 11.45	+ 1.58 + 0.88	+31.43 -33.43	- 20.39 + 20.39	+18 54 41.85
11	15 Vulpeculæ	E W	2.5 ...	19 54 29.5 19 59 53.0	2 43.1 2 40.4	48.75 50.95	49.65 51.90	..... .....	47 48 19.82 24 56 24.28	+ 0.33 + 2.61	-50.54 +48.87	+ 11.33 - 11.33	+27 29 58.51
12	α ¹ Capricorni	W E	3 ...	20 9 40.0 20 15 7.0	2 45.4 2 41.6	50.15 49.25	51.30 50.45	..... .....	344 40 20.12 88 4 24.68	+ 1.89 + 0.99	+14.42 -13.77	-1 10.80 +1 10.80	-12 47 41.77
13	π Capricorni	E W	3 ...	20 19 15.0 20 24 43.0	2 40.7 2 47.3	49.00 50.40	50.25 51.50	..... .....	93 47 24.25 338 57 18.65	+ 0.78 + 2.14	-12.33 +13.36	+1 27.38 -1 27.38	-18 30 59.89
14	29 Vulpeculæ	W E	3 ...	20 31 34.0 20 37 8.7	2 44.3 2 50.4	49.95 49.05	51.15 50.40	..... .....	18 19 25.25 54 25 22.40	+ 1.73 + 0.89	+34.55 -37.16	- 18.25 + 18.25	+20 52 36.22
15	September 7, L. ξ Draconis	W E	2.5 ...	17 49 9.0 17 54 30.0	2 43.1 2 37.9	48.70 49.70	49.25 50.05	..... .....	54 20 45.50 18 23 58.75	+ 1.28 + 2.22	-19.98 +18.72	+ 17.68 - 17.70	+56 53 38.02
16	72 Ophiuchi	E W	3 ...	18 0 9.5 18 5 38.0	2 42.5 2 46.0	49.80 48.20	50.45 48.70	..... .....	65 44 11.98 7 0 31.28	+ 2.43 + 0.73	-22.53 +23.51	+ 30.73 - 30.75	+ 9 33 17.86
17	♂ Sagittarii	W E	4 ...	18 12 58.0 18 17 2.0	1 59.5 2 4.5	49.35 50.60	48.45 49.90	..... .....	327 37 18.18 105 7 25.52	+ 1.93 + 3.31	+ 5.64 - 6.12	-2 19.58 +2 19.58	-29 52 1.28
18	153 H ¹ . Draconis	W E	3 ...	18 33 19.0 18 38 39.0	2 34.9 2 45.1	49.45 50.45	48.40 49.55	..... .....	62 51 29.90 9 53 14.28	+ 1.95 + 3.05	- 9.50 +10.79	+ 27.29 - 27.30	+65 24 41.19
19	30 Sagittarii	E W	3.5 ...	18 43 22.0 18 48 5.0	1 48.4 2 54.6	50.55 49.70	49.70 48.85	..... .....	97 32 8.70 335 12 28.92	+ 3.15 + 2.29	- 5.27 +13.66	+1 39.12 -1 39.11	-22 16 3.19
20	τ Sagittarii	W E	4 ...	18 58 26.0 19 3 49.0	2 37.5 2 45.5	48.70 50.80	47.50 50.00	..... .....	329 40 41.88 103 4 5.40	+ 1.10 + 3.43	+10.14 -11.19	-2 6.41 +2 6.39	-27 48 21.88

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
6 18 3	69.0	...	...	2. Instrument in meridian; E. observation at II; W. observation at I with movable thread.	1	36 22 23.70	.....
18 11	69.2	...	...	6. Instrument in meridian, observation at IX with movable thread.	2	24.47	-23.48
18 24	68.5	...	...		3	23.78	.....
18 36	68.5	...	...		4	24.28	-25.25
18 50	68.2	69.8	29.902		5	23.86	.....
19 1	67.8	...	...		6	23.86	-22.53
19 13	67.6	...	...		7	24.30	.....
19 22	67.5	...	...		8	24.22	-21.32
19 33	67.1	...	...		9	24.38	-19.79
19 45	66.7	68.3	29.906		10	24.36	-20.37
19 57	66.6	...	...		11	22.68	-21.73
20 13	66.6	...	...		12	24.16	.....
20 22	66.6	...	...		13	23.42	.....
20 36	66.6	67.8	29.899	Notes.	14	23.83	-20.54
7 17 52	77.6	79.8	29.756	4. Poor; very faint.	15	23.24	.....
18 3	76.2	...	...	7. Faint.	16	23.69	.....
18 9	75.8	...	...	15 W. One level reading decreased 10 div.	17	24.23	.....
18 16	75.9	...	...		18	25.23	-25.40
18 37	74.8	...	...		19	25.73	- 7.91
18 46	75.2	...	...		20	25.37	- 6.92
18 54	...	76.4	29.750				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	22 Aquilæ	E W	3 ...	19 9 1.5 19 14 29.5	2 49.2 2 38.8	51.05 49.25	50.35 48.15	..... .....	70 36 58.32 2 7 48.80	+ 3.75 + 1.73	-21.51 +18.95	+ 37.26 - 37.25	+ 4 40 23.98
2	186 G. Sagittarii	W E	4 ...	19 18 45.0 19 23 47.0	2 14.3 2 47.7	48.65 50.85	47.85 50.05	..... .....	327 33 42.12 105 11 7.80	+ 1.27 + 3.50	+ 7.11 -11.09	-2 20.11 +2 20.15	-29 55 38.20
3	51 B. Cygni	E W	2 ...	19 34 ..... .....	..... .....	51.00 49.25	50.15 48.30	25.148 25.148	31 47 23.52 40 56 57.92	+ 4.37 + 2.51	+ 0.32 - 0.32	- 4.39 + 4.39	+43 30 7.12
4	ζ Sagittæ	E W	3 ...	19 42 5.5 19 47 36.5	2 41.8 2 49.2	50.80 49.30	49.90 48.20	..... .....	56 23 7.10 16 21 34.98	+ 3.40 + 1.77	-30.71 +33.58	+ 19.99 - 20.00	+18 54 42.06
5	τ Aquilæ	W E	2.5 ...	19 56 46.5 20 2 18.5	2 45.4 2 46.6	47.75 50.30	47.00 49.55	..... .....	4 28 23.50 68 16 23.58	+ 0.34 + 2.95	+21.80 -22.12	- 34.17 + 34.19	+ 7 1 3.22
6	68 Draconis	E W	3 ...	20 8 17.0 20 13 10.0	1 45.2 3 7.8	50.60 49.50	49.85 48.45	..... .....	13 29 55.05 59 15 3.22	+ 3.29 + 1.99	+ 5.71 -18.18	- 23.19 + 23.20	+61 48 1.46
7	296 G. Sagittarii	W E	3.5 ...	20 17 14.0 20 22 23.0	2 26.9 2 42.1	48.85 50.35	47.85 49.50	..... .....	328 31 16.98 104 13 31.98	+ 1.36 + 2.98	+ 8.65 -10.53	-2 14.06 +2 14.04	-28 57 55.99
8	13 G. Microscopii	E W	4 ...	20 31 39.0 20 37 45.0	2 45.9 3 20.1	50.55 49.30	49.60 48.05	..... .....	109 0 37.98 323 44 4.28	+ 3.11 + 1.72	-10.17 +14.79	+2 53.60 -2 53.60	-33 45 41.88
9	September 11. L. 72 Ophiuchi.	W E	2.5 ...	18 0 3.0 18 5 36.0	2 49.1 2 43.9	48.60 50.15	48.05 49.95	..... .....	7 0 33.15 65 44 15.68	+ 0.14 + 1.90	+24.40 -22.92	- 30.54 + 30.57	+ 9 33 17.74
10	δ Sagittarii	E W	3.5 ...	18 12 18.0 18 17 46.0	2 39.6 2 48.4	50.05 49.85	49.75 49.10	..... .....	105 7 32.05 327 37 11.88	+ 1.78 + 1.33	-10.05 +11.19	+2 18.81 -2 18.89	-29 52 1.76
11	153 H ¹ . Draconis	W E	2.5 ...	18 33 36.0 18 38 42.0	2 17.8 2 48.2	49.70 50.20	49.15 49.65	..... .....	62 51 29.10 9 53 15.12	+ 1.30 + 1.80	- 7.52 +11.20	+ 27.14 - 27.14	+65 24 41.30
12	30 Sagittarii	W E	3.5 ...	18 42 32.0 18 48 9.0	2 38.5 2 58.5	50.15 50.00	49.45 49.40	..... .....	335 12 30.78 97 32 20.32	+ 1.65 + 1.54	+11.26 -14.28	-1 38.58 +1 38.59	-22 16 3.75
13	τ Sagittarii	E W	3.5 ...	18 58 28.0 19 3 41.0	2 35.6 2 37.4	50.10 51.80	49.45 51.10	..... .....	103 4 6.98 329 40 38.55	+ 1.62 + 3.35	- 9.89 +10.12	+2 5.74 -2 5.78	-27 48 22.32
14	22 Aquilæ	W E	2.5 ...	19 9 11.0 19 14 25.5	2 39.8 2 34.7	51.35 50.25	50.65 49.70	..... .....	2 7 47.92 70 36 57.10	+ 2.91 + 1.83	+19.19 -17.98	- 37.12 + 37.13	+ 4 40 24.19
15	21 B. Vulpeculæ	E W	2.5 ...	19 18 39.0 19 24 11.5	2 52.3 2 40.2	50.00 52.10	49.20 51.45	..... .....	50 33 18.42 22 11 34.22	+ 1.46 + 3.70	-46.70 +40.38	+ 13.79 - 13.80	+24 44 55.54
16	51 B. Cygni	W E	..... .....	19 34 ..... .....	..... .....	51.30 50.05	50.80 49.60	25.193 25.193	40 56 57.78 31 47 24.72	+ 2.21 + 0.96	- 0.32 + 0.32	+ 4.37 - 4.37	+43 30 7.98
17	γ Aquilæ	E W	2.5 ...	19 45 6.0 19 50 12.0	2 34.2 2 31.8	50.15 52.90	49.50 52.35	..... .....	74 31 6.85 358 13 38.98	+ 1.69 + 4.57	-16.33 +15.83	+ 42.88 - 42.89	+0 46 7.48
18	15 Vulpeculæ	W E	2.5 ...	19 55 30.5 19 59 11.7	1 42.4 1 58.8	51.90 50.70	51.40 50.10	..... .....	24 56 55.78 47 47 56.68	+ 3.55 + 2.25	+19.93 -26.82	- 11.05 + 11.05	+27 29 59.30
19	α ¹ Capricorni	E W	2.5 ...	20 9 38.5 20 15 4.0	2 47.1 2 38.4	50.75 53.00	49.90 52.65	..... .....	88 4 27.42 344 40 17.75	+ 2.18 + 5.05	-14.72 +13.23	+1 9.14 -1 9.14	-12 47 41.78

Time.	Ther. 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
7 19 1	74.9	...	...	3 Instrument in meridian, observation at I with movable thread.	1	36 22 25.02	-10.84
19 12	75.4	...	...	16. Instrument in meridian, observation at IX with movable thread.	2	25.18	- 7.28
19 22	75.5	...	...		3	24.49	-23.97
19 32	74.8	...	...		4	25.06	-20.51
19 45	73.9	75.4	29.744		5	25.04	.....
20 0	73.5	...	...		6	25.54	-23.72
20 11	73.2	...	...		7	25.70	-10.51
20 20	73.4	...	...		8	25.86	-10.10
20 35	74.5	74.6	29.716		9	26.19	.....
20 41	71.5	...	...		10	24.05	.....
11 18 3	81.5	82.4	29.873		11	25.60	-25.97
18 15	80.6	...	...		12	25.04	- 7.88
18 16	80.0	...	...		13	25.14	- 6.82
18 46	80.1	...	...		14	25.49	-17.12
18 59	79.9	81.2	29.881		15	25.74	-21.99
19 7	79.6	...	...		16	25.20	-24.51
19 12	79.4	...	...		17	25.79	-10.95
19 22	79.2	...	...		18	25.68	-22.54
19 15	79.1	...	...		19	25.46	.....
19 48	78.9	80.2	29.898				
20 11	78.2	...	...		
20 24	78.5	...	...		
20 33	...	79.6	29.897				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	September 12, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / //</i>	<i>//</i>	<i>//</i>	<i>/ //</i>	<i>° / //</i>
1	ϵ^1 Lyrae (mean)	W E	2.5	18 41	.....	51.90 52.35	51.50 52.20	26.887 26.887	37 0 27.62 35 41 36.50	+ 0.25 + 0.86	- 0.18 + 0.18	+ 0.63 - 0.63	+39 34 42.48
2	α Draconis	E W	2.5	18 47 11.0 18 52 46.0	2 36.5 2 58.5	52.00 52.25	52.25 52.10	..... .....	16 0 55.08 56 43 54.12	+ 1.27 + 1.35	+15.26 -19.85	- 20.29 + 20.29	+59 16 49.08
3	ϵ Lyrae	W E	2.5	19 4	.....	52.00 51.85	51.85 51.85	26.733 26.733	33 23 27.30 39 18 48.35	+ 0.51 + 0.41	- 0.16 + 0.16	- 2.83 + 2.83	+35 57 33.32
4	η Aquilæ	W E	2.5	19 44 51.0 19 50 25.5	2 49.2 2 45.3	51.10 52.20	50.80 51.95	..... .....	358 13 37.42 74 31 7.12	+ 0.09 + 1.24	+19.67 -18.77	- 42.08 + 43.00	+ 0 46 7.58
5	β^2 Capricorni	E W	3.5	20 13 12.0 20 18 36.0	2 31.2 2 52.8	51.65 51.35	51.35 51.05	..... .....	90 21 3.28 342 23 37.05	+ 0.65 + 0.35	-11.58 +15.12	+1 15.21 -1 15.23	-15 4 28.36
6	September 14, L. 22 H. Camelop. S. P.	E W	4.5	18 5 52.0 18 11 44.0	2 36.6 3 15.4	49.85 52.40	48.70 51.25	..... .....	324 41 28.65 108 3 17.10	+ 0.56 + 3.17	- 3.87 + 6.02	-2 47.42 +2 47.54	+69 20 55.25
7	23 H. Camelop. S. P.	W E	4	18 27 24.0 18 32 46.0	2 47.4 2 34.6	52.25 49.70	50.90 48.25	..... .....	97 45 38.92 334 59 8.52	+ 2.93 + 0.25	+ 2.43 - 2.07	+1 42.49 -1 42.54	+79 39 41.91
8	ϵ^1 Lyrae (mean)	E W	2	18 41	.....	49.55 52.45	48.15 51.10	26.974 26.974	35 41 35.42 37 0 22.38	+ 0.87 + 3.84	+ 0.28 - 0.28	- 0.64 + 0.64	+39 34 42.11
9	ϵ Lyrae	E W	3	19 4	.....	52.00 50.45	50.60 48.90	26.724 26.724	39 18 48.12 33 23 28.52	+ 3.36 + 1.71	+ 0.24 - 0.24	+ 2.91 - 2.91	+35 57 33.01
10	159 B. Lyrae	W E	.....	19 16	.....	49.70 51.50	48.25 50.05	26.882 26.882	37 37 24.48 35 4 44.85	- 0.47 + 1.35	- 0.28 + 0.28	+ 1.25 - 1.25	+40 11 36.67
11	ϵ Aquilæ	E W	4	19 22 56.0 19 28 16.0	2 47.9 2 32.1	52.00 51.45	50.40 49.65	..... .....	78 15 57.72 354 28 52.42	+ 2.50 + 1.85	-17.89 +14.68	+ 50.52 - 50.54	- 2 58 50.43
12	ϵ Sagittarii	W E	3.5	19 34 16.0 19 39 44.0	2 51.8 2 36.2	50.40 51.65	48.50 50.00	..... .....	341 7 46.82 91 36 59.90	+ 0.76 + 2.14	+14.63 -12.09	-1 21.08 +1 21.10	-16 20 28.17
13	β^2 Capricorni	W E	4	20 13 12.0 20 18 29.0	2 31.2 2 45.8	51.45 51.60	49.40 49.65	..... .....	342 23 44.78 90 21 6.28	+ 1.75 + 1.95	+11.58 -13.93	-1 17.54 +1 17.54	-15 4 28.85
14	September 18, L. 22 H. Camelop. S. P.	W E	4	18 6 11.0 18 11 48.0	2 17.8 3 19.2	48.80 51.60	48.80 51.40	..... .....	108 3 27.80 324 41 23.32	+ 0.43 + 3.19	+ 2.99 - 6.25	+2 44.01 -2 43.97	+69 20 53.74
15	23 H. Camelop. S. P.	E W	3.5	18 27 39.0 18 33 28.0	2 33.2 3 15.8	51.20 49.80	51.15 49.55	..... .....	334 59 3.10 97 45 42.45	+ 2.85 + 1.33	- 2.03 + 3.32	-1 40.32 +1 40.36	+79 39 41.28
16	β Lyrae	W E	2	18 47	.....	49.20 51.35	49.00 51.35	26.864 26.864	30 41 29.75 42 0 39.88	+ 0.01 + 2.29	- 0.22 + 0.22	- 5.45 + 5.45	+33 15 34.91
17	γ Lyrae	E W	2	18 56	.....	51.30 48.90	51.20 48.60	..... .....	42 43 28.15 30 1 11.42	+ 3.66 + 1.10	+ 0.22 - 0.22	+ 6.13 - 6.13	+32 34 0.79
18	θ Lyrae	W E	2	19 13	.....	48.70 51.50	48.60 51.40	28.123 28.123	35 23 21.55 37 17 4.25	- 0.46 + 2.40	- 0.26 + 0.26	- 0.91 + 0.91	+37 58 22.84

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				<i>° ' "</i>	<i>"</i>
12 18 40	77.6	....	....	1.3.	Instrument in meridian, observation at VIII with movable thread.	1	36 22 24.16	-24.21
18 50	77.3	79.9	29.825	8.9.	Instrument in meridian, observation at I with movable thread.	2	23.62	....
19 2	77.3	....	....	10, 16, 18.	Instrument in meridian, observation at IX with movable thread.	3	23.54	....
19 48	76.5	78.4	29.830	17.	Instrument in meridian, observation at I between fixed thread and movable at 25.097 rev.	4	23.40	-17.00
20 16	76.2	....	....			5	22.42	....
20 31	76.1	....	....			6	25.88	....
20 36	....	77.8	29.837			7	25.46	....
14 18 5	66.6	68.3	29.907			8	26.36	-24.34
18 12	66.2	....	....			9	25.74	....
18 30	65.6	....	....			10	26.46	-24.77
18 39	65.2	....	....			11	25.63	-15.42
18 52	64.6	....	....			12	26.09	-11.85
19 2	64.6	....	....			13	26.20	....
19 14	64.2	....	....			14	25.76	....
19 26	63.6	65.4	29.928			15	25.53	....
19 37	63.6	....	....			16	26.58	....
20 14	62.7	....	....			17	26.40	....
20 21	62.6	....	....			18	25.90	....
20 31	62.6	....	....			
20 35	....	63.9	29.937	Notes.				
18 18 7	78.2	79.7	29.986	3. Faint; field illumination poor.				
18 12	78.3	....	....	10. Too faint for good observation.				
18 28	77.7	....	....			
18 34	77.5	....	....			
18 53	77.3	....	....			
19 12	76.5	78.0	29.989					

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>"</i>	<i>° ' "</i>
1	8 Cygni	E	2	19 28		51.20	51.15	29.933	40 58 34.02	+ 3.57	+ 0.22	+ 4.49	+34 15 33.75
		W				48.80	48.60	29.933	31 39 19.88	+ 1.06	- 0.22	- 4.49	
2	41 Cygni	E	2	20 26		50.15	49.90	25.537	45 13 25.65	+ 2.41	+ 0.19	+ 8.60	+30 3 39.63
		W				49.75	49.60	25.537	27 30 29.30	+ 2.02	- 0.19	- 8.60	
3	λ Cygni	W	3	20 44		49.90	49.65	27.462	33 34 33.35	+ 0.67	- 0.24	- 2.67	+36 9 6.46
		E				50.40	50.00	27.462	39 6 47.75	+ 1.11	+ 0.24	+ 2.67	
4	September 19, L. δ Ursæ Minoris	E	2	18 0 4.0	2 22.3	49.10	48.50		348 41 24.70	+ 4.84	+ 0.68	- 59.70	+86 37 13.12
		W		18 5 28.0	3 1.7	50.95	50.15		84 3 17.92	+ 6.63	- 1.11	+ 59.74	
5	ε Sagittarii	W	4	18 15 14.0	2 41.3	48.75	47.60		323 4 13.55	+ 4.16	+ 9.50	- 59.57	-34 25 42.05
		E		18 20 41.0	2 45.7	51.20	50.25		109 40 28.90	+ 6.78	- 10.03	+ 59.06	
6	ε Aquilæ	W	2.5	19 23 3.0	2 41.1	46.80	46.05		354 28 49.90	+ 2.38	+ 16.47	- 49.14	- 2 58 50.04
		E		19 28 20.0	2 35.9	50.00	49.25		78 15 53.92	+ 5.63	- 15.42	+ 49.14	
7	ε Sagittarii	E	3.5	19 34 21.0	2 47.0	48.70	48.05		91 37 1.95	+ 4.39	- 13.82	+ 18.80	- 16 20 28.21
		W		19 39 52.0	2 44.0	48.40	47.65		341 7 42.72	+ 4.07	+ 13.33	- 18.80	
8	φ Aquilæ	W	3	19 49 14.0	2 32.5	46.05	45.20		8 38 2.55	+ 1.54	+ 20.80	- 28.85	+ 11 10 46.33
		E		19 54 12.0	2 25.5	50.40	49.65		64 6 40.98	+ 6.07	- 18.94	+ 28.85	
9	τ Aquilæ	E	3	19 57 28.0	2 4.2	49.80	49.35		68 16 13.52	+ 5.61	- 12.29	+ 34.15	+ 7 1 2.74
		W		20 2 25.0	2 52.8	48.10	47.40		4 28 19.50	+ 3.75	+ 23.80	- 34.16	
10	68 Draconis	W		20 8 5.0	1 57.3	44.50	43.60		59 14 58.48	- 0.04	- 7.10	+ 23.17	+ 61 48 4.06
		E		20 12 27.0	2 24.7	51.75	51.15		13 29 44.78	+ 7.56	+ 10.80	- 23.17	
11	ρ Capricorni	E	3	20 20 37.0	2 52.6	48.55	47.85		93 23 45.82	+ 4.24	- 14.32	+ 24.38	- 18 7 15.93
		W		20 26 2.0	2 32.4	50.50	49.60		339 21 1.82	+ 6.10	+ 11.16	- 24.39	
12	13 G. Microscopii	W	4.5	20 32 2.0	2 24.0	46.80	46.00		323 44 10.90	+ 2.34	+ 7.66	- 53.58	- 33 45 42.91
		E	4	20 37 8.0	2 42.0	49.50	48.80		109 0 37.60	+ 5.17	- 9.70	+ 53.64	
13	ω Capricorni	E	3.5	20 43 32.0	2 40.6	48.60	47.95		102 31 50.70	+ 4.33	- 10.63	+ 3.63	- 27 16 3.91
		W		20 48 57.0	2 44.4	50.65	49.90		330 12 52.82	+ 6.34	+ 11.14	- 3.66	
14	September 21, L. β Lyrae	E	2	18 47		49.50	49.60	26.827	42 0 39.38	+ 7.94	+ 0.14	+ 5.41	+ 33 15 35.11
		W				49.25	49.25	26.827	30 41 27.40	+ 7.05	- 0.14	- 5.41	
15	γ Lyrae	W	2	18 55		49.05	48.90	25.043	30 1 9.30	+ 6.06	- 0.22	- 6.08	+ 32 34 0.81
		E				49.80	49.50	25.043	42 43 27.95	+ 6.76	+ 0.22	+ 6.08	
16	159 B. Lyrae	E	2	19 16		49.95	49.65	26.817	35 4 43.98	+ 8.35	+ 0.28	- 1.21	+ 40 11 37.27
		W				49.05	48.75	26.817	37 37 23.98	+ 7.45	- 0.28	+ 1.21	
17	8 Cygni	W	2	19 28		48.55	48.50	27.048	31 41 18.95	+ 5.61	- 0.22	- 4.46	+ 34 15 34.27
		E				50.05	49.85	27.048	41 0 33.18	+ 7.05	+ 0.22	+ 4.46	
18	228 G. Sagittarii	E	3.5	19 37 26.0	2 35.1	49.60	49.40		107 23 12.62	+ 7.34	- 9.14	+ 37.34	- 32 8 0.67
		W		19 42 48.0	2 46.9	48.05	47.90		325 21 34.22	+ 5.79	+ 10.58	- 37.35	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
18 19 12	76.5	...	...	1, 2, 16. Instrument in meridian, observation at I with movable thread.	1	36 22 25.20	- 24.28
20 4	76.1	77.2	29.993	3, 15, 17. Instrument in meridian, observation at IX with movable thread.	2	26.11	- 23.55
20 29	75.6	...	...	14. Instrument in meridian, observation at II with movable thread.	3	26.47	...
20 45	75.5	77.0	29.995		4	26.85	...
19 18 0	80.6	...	...		5	26.48	...
18 6	80.3	82.7	29.889		6	26.44	- 15.33
18 12	79.1	...	...		7	26.12	- 11.55
18 10	78.9	...	...		8	26.50	- 19.82
19 8	...	79.3	29.892		9	26.94	...
19 26	77.0	...	...		10	27.24	- 20.10
19 37	77.6	...	...		11	27.40	...
19 42	76.7	...	...		12	27.02	- 8.78
20 0	76.5	...	...		13	27.14	- 11.03
20 10	76.5	78.4	29.896		14	30.28	...
20 14	76.5	...	...		15	31.28	...
20 15	76.0	...	...		16	30.57	- 25.50
20 44	71.8	78.0	29.893		17	30.52	- 24.60
21 18 45	79.6	80.8	29.872		18	30.70	- 6.53
18 54	79.2	...	...		
19 14	78.9	...	...		
19 27	78.3	...	...	Note. 16. Very faint.			
19 36	78.2	...	...		
19 41	78.2	...	...		
19 51	...	79.3	29.876				
19 58	78.2	...	...		
20 11	77.6	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	9 Sagittarii	E	3	19 50 4.0	2 33.1	50.00	50.50	.....	91 0 45.50	+ 1.05	- 11.74	+ 18.00	-15 44 15.12
		W	...	19 55 28.0	2 50.9	50.60	51.30	.....	341 43 50.55	+ 1.80	+ 14.62	- 18.00	
2	4 Capricorni	W	4	20 9 44.0	2 46.2	50.30	51.00	.....	335 22 38.95	+ 1.45	+ 12.42	- 1 39.63	-22 5 50.71
		E	...	20 15 17.0	2 46.8	50.10	50.70	.....	97 21 59.95	+ 1.17	- 12.51	+ 1 39.60	
3	69 Aquilæ	E	3	20 22 3.0	2 41.2	50.10	50.60	.....	78 28 38.78	+ 1.14	- 16.42	+ 50.06	- 3 11 36.56
		W	...	20 27 26.0	2 41.8	50.50	50.95	.....	354 15 58.80	+ 1.58	+ 16.54	- 50.07	
4	κ Delphini	W	2.5	20 32 3.0	2 30.8	50.30	50.80	.....	7 12 52.08	+ 1.36	+ 19.52	- 30.92	+ 9 45 37.94
		E	...	20 37 26.0	2 52.2	49.65	50.50	.....	65 31 53.45	+ 0.84	- 25.45	+ 30.93	
5	μ Aquarii	E	3	20 44 55.0	2 40.2	49.65	50.45	.....	84 36 43.10	+ 0.84	- 14.40	+ 1 2.02	- 9 19 55.08
		W	...	20 50 13.0	2 37.8	50.60	51.05	.....	348 7 54.18	+ 1.68	+ 13.97	- 1 2.03	
6	η Capricorni	W	3.5	20 56 21.0	2 42.7	50.50	50.90	.....	337 14 59.00	+ 1.51	+ 12.28	- 1 32.46	-20 13 23.44
		E	...	21 1 46.0	2 42.3	49.80	50.50	.....	95 29 39.55	+ 0.98	- 12.22	+ 1 32.49	
7	G Cephei	E	3	21 7 30.0	1 55.4	49.50	50.25	.....	15 41 23.12	+ 0.69	+ 8.09	- 20.95	+59 36 26.38
		W	...	21 12 2.0	2 36.6	50.50	50.95	.....	57 3 22.50	+ 1.50	- 14.90	+ 20.95	
8	69 Cygni	W	2.5	21 22 ....	.....	50.55	50.75	27.458	33 41 26.42	+ 0.91	- 0.16	- 2.57	+36 16 5.30
		E	...	.....	.....	49.45	49.95	27.458	38 59 44.92	- 0.06	+ 0.16	+ 2.57	
9	ξ Aquarii	E	3	21 30 5.0	2 40.2	49.55	50.30	.....	83 33 8.58	+ 0.73	- 14.69	+ 59.80	- 8 16 16.86
		W	...	21 35 24.0	2 38.8	50.65	50.80	.....	349 11 30.92	+ 1.50	+ 14.43	- 59.81	
10	October 6, L. 43 Camelop. S. P.	E	4	18 43 10.0	0 26.4	49.25	49.90	.....	324 19 51.30	+ 0.58	- 0.11	- 2 51.30	+68 59 31.44
		W	...	18 49 0.0	5 23.6	49.90	50.60	.....	108 24 14.75	+ 1.23	+ 16.74	+ 2 51.25	
11	51 H. Cephei S. P.	W	3.5	18 52 24.0	4 28.3	49.70	50.55	.....	90 14 17.25	+ 1.11	+ 1.85	+ 16.74	+87 11 26.19
		E	...	18 58 20.0	1 27.7	49.15	49.85	.....	342 30 19.50	+ 0.47	- 0.20	- 16.81	
12	25 H. Camelop. S. P.	E	4	19 8 38.0	2 46.5	49.00	49.85	.....	337 54 24.12	+ 0.39	- 1.78	- 1 31.42	+82 35 15.09
		W	...	19 15 4.0	3 39.5	50.05	50.95	.....	94 50 11.48	+ 1.48	+ 3.10	+ 1 31.45	
13	γ Cygni	W	3	19 24 52.5	2 27.7	50.00	50.70	.....	48 59 27.42	+ 1.35	- 26.36	+ 12.61	+51 32 12.57
		E	...	19 30 24.3	3 4.1	49.05	49.40	.....	23 44 54.98	+ 0.20	+ 40.94	- 12.62	
14	10 Vulpeculæ	E	3	19 37 10.0	2 38.8	49.30	50.00	.....	49 44 51.80	+ 0.63	- 41.74	+ 13.40	+25 33 11.27
		W	...	19 44 12.3	4 23.5	49.85	50.30	.....	22 58 30.62	+ 1.06	+ 54.74	- 13.42	
15	33 Cygni	E	3	20 8 22.5	2 50.8	50.20	50.60	.....	19 0 14.98	+ 1.39	+ 23.01	- 17.68	+56 17 15.67
		W	...	20 13 59.0	2 45.7	49.75	49.85	.....	53 44 22.65	+ 0.77	- 21.67	+ 17.68	
16	69 Aquilæ	W	3	20 22 6.0	2 39.0	49.25	49.35	.....	354 16 0.95	+ 0.31	+ 15.98	- 51.10	- 3 11 36.49
		E	...	20 27 28.0	2 43.0	49.90	49.95	.....	78 28 37.50	+ 0.91	- 16.79	+ 51.11	
17	λ Cygni	E	3	20 44 ....	.....	50.25	50.15	.....	39 8 26.98	+ 1.92	+ 0.24	+ 2.74	+36 9 9.36
		W	...	.....	.....	50.00	49.70	.....	33 36 18.40	+ 1.56	- 0.24	- 2.74	
18	γ Microscopii	W	4	20 52 48.0	2 44.8	49.50	49.25	.....	324 52 17.78	+ 0.35	+ 10.23	- 2 47.83	-32 37 22.41
		E	4.5	20 58 10.0	2 37.2	49.60	49.45	.....	107 52 19.92	+ 0.50	- 9.31	+ 2 47.87	

Time.	Ther- 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
29 20 10	71.7			8. Instrument in meridian, observation at VIII with movable thread.	1	36 22 20.89	-12.05
20 16	71.8			10. Instrument in meridian, observation between fixed thread and movable at 20.181 rev.	2	20 70	-10.05
20 35	71.6			17. Instrument in meridian, observation at I between fixed thread and movable at 24.638 rev.	3	20 20	-16.90
20 44					4	20 90	-20.58
20 47	71.5	73.3	29.901		5	19 68	
20 57	71.4				6	20 60	-12.78
21 2	71.2				7	20 61	-26.78
21 10	71.2				8	20 96	-25.07
21 20	71.1				9	20 76	
21 31	71.1				10	18 18	+21.67
21 44	70.6				11	19 96	
21 49		72.3	29.898		12	19 41	
6 18 44	57.6				13	19 26	
18 49	57.6				14	18 54	-23.91
18 53	57.6				15	20 66	
18 59	57.2	59.3	29.440		16	19 44	-16.79
19 9	56.6				17	19 29	
19 16	56.5				18	19 76	
19 24	56.2						
19 31	55.9						
19 38	56.2						
19 44	56.2	57.4	29.462	Notes.			
20 9	54.0			9. Clouds			
20 12	54.6			10. Very faint.			
20 24	54.4						
20 28	54.4						
20 42	51.6	55.4	29.478				
20 55	51.1						

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	α Equulei	E	3.5	21 8 20.0	2 48.5	50.00	49.65	.....	70 25 26.88	+ 0.83	-21.43	+ 38.34	+ 4 51 51.68
		W	...	21 13 47.0	2 38.5	49.75	49.50	.....	2 19 13.12	+ 0.62	+18.97	- 38.35	
2	69 Cygni	E	2.5	21 22 ....	.....	49.55	49.25	24.709	39 1 33.70	+ 1.13	+ 0.24	+ 2.63	+36 16 6.73
		W	...	.....	.....	49.65	49.25	24.709	33 43 19.22	+ 1.18	- 0.24	- 2.63	
3	ϵ Aquarii	W	3	21 30 13.0	2 33.0	49.40	48.95	.....	349 11 33.92	+ 0.18	+13.40	-1 1.24	- 8 16 17.39
		E	...	21 35 31.0	2 45.0	49.50	49.35	.....	83 33 8.60	+ 0.41	-15.59	+1 1.24	
4	14 Pegasi	E	2.5	21 46 ....	.....	49.60	49.25	23.998	45 33 26.65	+ 1.15	+ 0.19	+ 9.18	+29 44 35.49
		W	...	.....	.....	49.70	49.40	.....	27 11 46.18	+ 1.29	- 0.19	- 9.18	
5	ϵ Pegasi	W	3.5	22 0 22.5	2 16.9	49.10	48.55	.....	22 20 21.05	- 0.21	+29.76	- 14.21	+24 53 33.10
		E	...	22 5 24.3	2 44.9	49.35	49.00	.....	50 24 32.62	+ 0.14	-43.16	+ 14.21	
6	October 7, L. ϕ Draconis	W	3	18 19 34.0	2 30.3	49.30	49.80	.....	68 44 10.38	+ 0.76	- 5.74	+ 35.53	+71 17 42.31
		E	...	18 24 48.0	2 43.7	49.20	49.65	.....	4 0 18.02	+ 0.65	+ 6.81	- 35.56	
7	43 Camelop. S. P.	E	3	18 42 12.0	1 24.5	48.50	49.25	.....	324 19 55.05	+ 0.13	- 1.14	-2 51.51	+68 59 33.55
		W	3.5	18 48 34.0	4 57.5	49.00	49.70	.....	108 24 15.62	+ 0.57	+14.15	+2 51.46	
8	51 H. Cephei S. P.	E	2.5	18 54 20.0	2 32.9	48.75	49.35	.....	342 30 20.48	+ 0.27	- 0.60	-1 16.84	+87 11 26.73
		W	...	18 59 40.0	2 47.1	48.80	49.45	.....	90 14 18.25	+ 0.34	+ 0.72	+1 16.91	
9	δ Ursæ Minoris S. P.	W	2.5	5 58 30.0	3 50.0	49.75	48.75	.....	90 48 23.98	+ 1.83	+ 1.62	+1 21.53	+86 37 15.19
		E	...	6 3 22.0	1 2.0	48.70	47.55	.....	341 56 13.95	+ 0.67	- 0.12	-1 21.55	
10	22 H. Camelop.	E	...	6 8 16.0	0 16.3	48.50	47.40	.....	5 57 18.88	+ 0.52	+ 0.08	- 34.32	+69 20 53.19
		W	...	6 11 34.0	3 1.7	49.70	48.60	.....	66 47 31.60	+ 1.77	- 9.76	+ 34.32	
11	ϕ Draconis S. P.	W	3	6 18 0.0	4 4.4	49.80	48.90	.....	106 6 32.45	+ 1.94	+ 8.67	+2 37.13	+71 17 43.95
		E	...	6 22 18.0	0 13.6	48.55	47.55	.....	326 37 58.22	+ 0.64	- 0.03	-2 37.12	
12	23 H. Camelop.	E	3	6 29 44.0	0 32.9	48.05	46.80	.....	355 38 50.02	- 0.02	+ 0.13	- 50.32	+79 39 38.51
		W	...	6 34 21.0	4 4.1	50.05	49.05	.....	77 5 57.70	+ 2.12	- 6.95	+ 50.34	
13	43 Camelop.	W	2.5	6 41 6.0	2 30.7	50.00	49.15	.....	66 26 5.92	+ 2.14	- 6.90	+ 33.82	+68 59 31.41
		E	...	6 46 6.0	2 29.3	48.15	46.85	.....	6 18 32.78	+ 0.05	+ 6.77	- 33.83	
14	51 H. Cephei	E	2.5	6 54 40.0	2 13.3	48.30	47.15	.....	348 7 17.52	+ 0.30	+ 0.49	-1 5.37	+87 11 24.34
		W	...	7 0 12.0	3 18.7	49.70	48.80	.....	84 37 21.85	+ 1.86	- 1.10	+1 5.39	
15	October 8, L. ϵ Cygni	E	2.5	19 24 27.0	2 53.3	48.60	49.05	.....	23 45 1.00	+ 1.16	+36.28	- 12.68	+51 32 12.55
		W	...	19 30 2.0	2 41.7	48.00	48.50	.....	48 59 35.55	+ 0.59	-31.60	+ 12.69	
16	15 Cygni	W	2	19 41 ....	.....	47.80	48.10	27.473	34 33 26.15	- 0.45	- 0.25	- 1.77	+37 8 4.31
		E	...	.....	.....	48.70	48.95	27.473	38 7 46.20	+ 0.46	+ 0.25	+ 1.77	
17	τ Aquilæ	E	3	19 56 50.0	2 43.6	48.80	48.95	.....	68 16 18.42	+ 1.19	-21.33	+ 35.26	+ 7 1 3.96
		W	...	20 2 17.0	2 43.4	48.15	48.80	.....	4 28 21.05	+ 0.78	+21.28	- 35.27	
18	33 Cygni	W	2.5	20 8 34.0	2 39.4	48.00	48.50	.....	53 44 23.18	+ 0.55	-20.04	+ 17.74	+56 17 16.65
		E	...	20 13 53.0	2 39.6	48.65	48.95	.....	19 0 18.28	+ 1.11	+20.10	- 17.74	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
6 21 11	53.2	...	...	2. Instrument in meridian, observation at I with movable thread.	1	36 22 19.49	.....
21 20	52.9	...	...	4. Instrument in meridian; E. observation at I; W. observation assumed as at I on fixed thread.	2	20.22	-26.03
21 28	...	54.7	29.506	6. Instrument in meridian, observation between fixed thread and movable at 25.111 rev.	3	20.46	.....
21 33	52.9	...	...	7. Instrument in meridian, observation between fixed thread and movable at 25.212 rev.	4	19.42	-24.63
21 44	52.9	...	...	16. Instrument in meridian, observation at IX with movable thread.	5	20.10	.....
22 3	52.7	...	...		6	19.92	-26.33
22 16	53.3	54.3	29.524		7	18.74	+21.71
7 18 20	62.3	64.3	29.690		8	19.76	.....
18 25	62.0	...	...		9	20.96	.....
18 43	61.2	...	...		10	21.54	.....
18 51	61.3	...	...		11	20.95	-26.33
18 57	61.2	...	...		12	21.51	.....
19 0	60.8	62.7	29.696		13	20.38	+21.73
5 57	46.6	48.8	29.948		14	20.47	.....
6 15	46.2	...	...		15	21.50	.....
6 19	46.2	...	...		16	21.66	-26.41
6 23	46.3	...	...		17	20.69	.....
6 30	46.2	...	...		18	21.59	.....
6 35	46.1	...	...		
6 42	46.6	...	...		
6 47	46.4	...	...		
6 55	46.9	48.2	29.963				
7 1	46.9	...	...		
8 19 25	61.5	62.8	29.917				
19 33	61.0	...	...		
19 57	60.9	...	...		
20 11	60.6	...	...		

Notes.
5, 9, 10, 11, 12, 14. Clouds.
Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Delphini	E	3	20 28 3.0	2 52.7	48.65	49.00	.....	60 56 18.78	+ 1.14	-29.49	+ 25.92	+14 21 20.81
		W	...	20 33 44.0	2 48.3	48.55	48.95	.....	11 48 21.20	+ 1.06	+28.01	- 25.92	
2	Aquarii	W	2.5	20 44 45.0	2 51.2	48.00	48.40	.....	348 7 55.25	+ 0.54	+16.44	-1 3.46	- 9 19 55.27
		E	...	20 50 15.0	2 38.8	48.70	49.05	.....	84 36 42.40	+ 1.20	-14.15	+1 3.47	
3	Capricorni	E	3	20 57 52.0	2 49.1	48.75	49.15	.....	92 52 36.10	+ 1.28	-13.87	+1 25.53	-17 36 10.30
		W	...	21 3 14.0	2 32.9	48.50	49.00	.....	339 52 7.98	+ 1.05	+11.34	-1 25.55	
4	Equulei	W	2.5	21 8 13.0	2 55.6	48.25	48.55	.....	2 19 10.90	+ 0.73	+23.28	- 38.34	+ 4 51 51.87
		E	...	21 13 52.0	2 43.4	48.80	49.25	.....	70 25 26.90	+ 1.38	-20.16	+ 38.34	
5	Capricorni	E	3	21 20 34.0	2 49.2	48.80	49.30	.....	97 28 52.88	+ 1.39	-12.84	+1 42.54	-22 12 46.81
		W	...	21 26 3.0	2 39.8	48.65	49.20	.....	335 15 46.52	+ 1.29	+11.46	-1 42.55	
6	Aquarii	E	3	21 30 21.0	2 25.2	48.90	49.40	.....	83 33 4.40	+ 1.49	-12.07	+1 1.24	- 8 16 16.90
		W	...	21 35 22.0	2 35.8	48.65	49.25	.....	349 11 33.65	+ 1.31	+13.90	-1 1.22	
7	14 Pegasi	W	...	21 46 .....	.....	48.45	49.25	.....	27 11 52.30	+ 0.48	- 0.19	- 9.18	+29 44 35.11
		E	...	.....	.....	49.00	49.50	.....	45 32 56.58	+ 0.86	+ 0.19	+ 9.18	
8	28 Aquarii	E	3.5	21 53 28.0	2 49.8	49.15	49.55	.....	75 7 38.90	+ 1.71	-19.54	+ 45.55	+ 0 9 30.49
		W	...	21 59 3.0	2 45.2	48.55	49.25	.....	357 36 59.80	+ 1.23	+18.49	- 45.55	
9	λ Cephei	W	3.5	22 5 36.0	2 45.5	48.50	48.80	.....	56 24 28.30	+ 0.97	-17.49	+ 20.72	+58 57 28.33
		E	...	22 11 19.0	2 57.5	48.70	49.30	.....	16 20 8.78	+ 1.30	+20.12	- 20.73	
10	October 9, L. φ Draconis S. P.	E	4	6 18 30.0	3 34.4	49.55	48.05	.....	326 38 4.58	+ 1.13	- 6.67	-2 37.13	+71 17 44.16
		W	3.5	6 23 6.0	1 1.6	49.70	48.40	.....	106 6 40.82	+ 1.35	+ 0.55	+2 37.23	
11	23 H. Camelop.	W	2.5	6 27 33.0	2 44.4	49.95	48.45	.....	77 5 53.22	+ 1.48	- 3.15	+ 50.36	+79 39 37.75
		E	...	6 33 9.0	2 51.6	49.85	48.40	.....	355 38 45.52	+ 1.43	+ 3.44	- 50.34	
12	43 Camelop.	E	2.5	6 40 54.0	2 43.0	49.70	48.30	.....	6 18 31.08	+ 1.29	+ 8.07	- 33.88	+68 59 31.40
		W	...	6 46 17.0	2 40.0	50.10	48.65	.....	66 26 7.95	+ 1.66	- 7.77	+ 33.88	
13	51 H. Cephei	W	2.5	6 54 6.0	2 48.6	50.50	48.90	.....	84 37 21.85	+ 2.04	- 0.79	+1 5.58	+87 11 24.24
		E	...	6 59 30.0	2 35.4	49.50	47.95	.....	348 7 17.72	+ 1.03	+ 0.67	-1 5.57	
14	25 H. Camelop.	E	2.5	7 8 30.0	2 55.6	48.80	47.25	.....	352 43 19.00	+ 0.31	+ 2.44	- 55.87	+82 35 13.06
		W	...	7 13 30.0	2 4.4	50.45	48.95	.....	80 1 21.65	+ 2.04	- 1.22	+ 55.89	
15	October 11, L. ν Draconis	E	2.5	18 52 58.0	2 34.0	48.50	48.20	.....	4 7 21.60	+ 0.13	+ 6.08	- 37.10	+71 10 45.13
		W	...	18 58 25.0	2 53.0	50.00	49.70	.....	68 37 16.20	+ 1.67	- 7.68	+ 37.14	
16	25 H. Camelop. S. P.	W	4	19 8 40.0	2 46.0	50.40	49.70	.....	94 50 9.05	+ 1.84	+ 1.77	+1 35.81	+82 35 14.71
		E	4.5	19 14 10.0	2 44.0	48.65	48.15	.....	337 54 28.95	+ 0.17	- 1.73	-1 35.86	
17	143 B. Camelop. S. P.	E	4	19 18 28.0	2 40.4	48.50	48.00	.....	323 59 53.75	+ 0.04	- 4.17	-3 3.75	+68 39 8.76
		W	...	19 23 52.0	2 43.6	50.30	49.65	.....	108 44 44.68	+ 1.79	+ 4.34	+3 3.89	
18	ν Draconis S. P.	E	4	6 52 48.0	2 44.0	49.10	50.05	.....	326 31 11.32	+ 0.64	- 3.92	-2 43.70	+71 10 47.40
		W	...	6 58 35.0	3 3.0	50.80	51.75	.....	106 13 24.90	+ 2.39	+ 4.89	+2 43.73	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm</i>			<i>° ' "</i>	<i>"</i>
20 22	60.5	62.6	29.913	7. Instrument in meridian, observation at IX between fixed thread and movable at 24.723 rev.	1	36 22 20.35	-22.03
20 29	60.5				2	20.84	
20 48	60.2				3	21.93	
20 48	60.1				4	21.52	
21 6	59.9				5	20.14	-12.20
21 11	59.9				6	21.15	
21 14	59.9	61.7	29.904		7	21.68	-24.92
21 21	59.6				8	20.10	-18.87
21 31	59.5				9	20.98	-26.28
21 35	59.6				10	20.91	-26.23
21 44	59.3				11	20.98	
21 54	59.6				12	21.14	+21.77
22 10	59.3	61.0	29.889		13	21.20	
2 6 17	41.2	44.7	29.636		14	22.12	
6 26	40.6				15	19.02	-27.81
6 34	40.7				16	20.00	
6 41	40.2				17	20.28	
6 47	40.1				18	20.12	-27.79
6 54	39.9						
7 8	39.9						
7 9	39.6						
7 14	39.6	42.8	29.616				
11 28 52	42.2	44.2	29.881				
19 1	41.6						
19 9	41.2						
19 17	40.9						
19 24	40.5	43.8	29.894				
6 51	32.1	33.6	30.096				

Notes.
2. Faint, haze.
9. Clouds.
14. Very faint; clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	25 H. Camelop.	W	3.5	7 8 48.0	2 38.2	50.65	51.55	.....	80 1 19.30	+ 2.21	- 1.98	+ 57.72	+82 35 12.76
		E	...	7 14 5.0	2 38.8	48.85	50.00	.....	352 43 20.62	+ 0.49	+ 2.00	- 57.73	
2	143 B. Camelop.	E	3	7 18 14.0	2 54.6	48.75	49.65	.....	6 38 55.58	+ 0.25	+ 9.50	- 34.57	+68 39 6.96
		W	...	7 23 34.0	2 25.4	50.90	51.75	.....	66 5 40.62	+ 2.43	- 6.59	+ 34.58	
3	October 12, L. Draconis	W	2.5	18 52 41.0	2 51.0	49.30	50.50	.....	68 37 16.00	+ 1.20	- 7.50	+ 37.17	+71 10 44.67
		E	...	18 58 23.0	2 51.0	49.00	50.35	.....	4 7 19.88	+ 0.97	+ 7.50	- 37.18	
4	25 H. Camelop. S. P.	E	3	19 9 2.0	2 24.3	48.45	50.00	.....	337 54 27.62	+ 0.49	- 1.34	- 1 35.84	+82 35 14.86
		W	...	19 14 2.0	2 35.7	49.35	51.05	.....	94 50 8.58	+ 1.48	+ 1.56	+ 1 35.95	
5	143 B. Camelop. S. P.	W	3	19 18 23.0	2 45.6	49.35	50.95	.....	108 44 44.38	+ 1.45	+ 4.44	+ 3 3.96	+68 39 9.07
		E	4	19 23 45.0	2 36.4	48.55	50.15	.....	323 59 53.30	+ 0.64	- 3.96	- 3 3.97	
6	October 12, L. Draconis S. P.	W	3	6 52 42.0	2 50.1	49.70	50.40	.....	106 13 27.68	+ 0.30	+ 4.22	+ 2 43.27	+71 10 46.72
		E	...	6 58 44.0	3 11.9	49.60	50.15	.....	326 31 11.25	+ 0.12	- 5.37	- 2 43.46	
7	25 H. Camelop.	E	3	7 8 20.0	3 6.5	49.55	50.30	.....	352 43 18.28	+ 0.17	+ 2.75	- 57.64	+82 35 12.92
		W	...	7 14 24.0	2 57.5	50.00	50.70	.....	80 1 19.98	+ 0.60	- 2.50	+ 57.69	
8	October 15, L. Cygni	E	2.5	19 41 ....	.....	48.95	51.75	27.483	38 7 42.30	+ 1.58	+ 0.16	+ 1.76	+37 8 4.12
		W	...	.....	.....	49.35	52.05	27.483	34 33 20.38	+ 1.94	- 0.16	- 1.76	
9	g Sagittarii	W	3	19 49 57.0	2 41.9	48.55	51.35	.....	341 43 52.12	+ 0.58	+ 13.12	- 1 19.34	-15 44 16.21
		E	...	19 55 20.0	2 41.1	48.40	51.40	.....	91 0 45.65	+ 0.52	- 12.99	+ 1 19.36	
10	b ² Cygni	E	2.5	20 6 ....	.....	48.45	51.50	.....	38 43 23.45	+ 1.18	+ 0.16	+ 2.32	+36 34 12.55
		W	...	.....	.....	49.15	52.00	.....	34 1 19.25	+ 1.80	- 0.16	- 2.32	
11	41 Cygni	W	2.5	20 26 ....	.....	48.50	51.50	25.516	27 30 28.10	- 0.11	- 0.19	- 8.82	+30 3 42.34
		E	...	.....	.....	48.35	51.40	25.516	45 13 19.15	- 0.23	+ 0.19	+ 8.82	
12	ψ Capricorni	E	4	20 37 51.0	2 42.9	48.75	51.60	.....	100 52 10.75	+ 0.79	- 11.25	+ 1 58.08	-25 36 22.24
		W	...	20 43 10.0	2 36.1	49.55	52.15	.....	331 52 26.55	+ 1.50	+ 10.33	- 1 58.14	
13	γ Microscopii	E	3.5	20 52 50.0	2 43.8	48.70	51.45	.....	107 52 20.32	+ 0.69	- 10.11	+ 2 47.76	-32 37 22.74
		W	...	20 58 28.0	2 54.2	49.60	52.35	.....	324 52 14.40	+ 1.62	+ 11.43	- 2 47.92	
14	3 Piscis Australis	W	3.5	21 5 11.0	2 34.1	49.15	52.15	.....	329 29 2.40	+ 1.29	+ 9.67	- 2 12.23	-28 0 1.04
		E	...	21 10 36.0	2 50.9	48.45	51.20	.....	103 15 36.00	+ 0.46	- 11.90	+ 2 12.28	
15	b Capricorni	W	4	21 20 42.0	2 42.0	49.45	52.25	.....	335 15 43.20	+ 1.50	+ 11.78	- 1 42.65	-22 12 47.80
		E	3.5	21 26 8.0	2 44.0	48.50	51.25	.....	97 28 51.98	+ 0.49	- 12.06	+ 1 42.67	
16	13 H. Cephei	E	2.5	21 33 29.0	2 31.0	48.50	51.30	.....	18 13 18.15	+ 0.53	+ 16.88	- 18.66	+57 4 18.02
		W	...	21 38 41.0	2 41.0	50.00	53.00	.....	54 31 17.68	+ 2.16	- 19.19	+ 18.66	
17	μ Capricorni	W	3	21 45 25.0	2 47.5	49.75	52.90	.....	343 28 36.45	+ 1.97	+ 14.48	- 1 15.13	-13 59 24.20
		E	...	21 50 54.0	2 41.5	48.30	51.15	.....	89 15 57.78	+ 0.33	- 13.47	+ 1 15.16	
18	ε Pegasi	E	3	22 0 6.0	2 34.3	48.75	51.30	.....	50 24 25.10	+ 0.65	- 37.80	+ 14.25	+24 53 32.98
		W	...	22 5 16.5	2 36.2	50.35	53.00	.....	22 20 7.72	+ 2.33	+ 38.73	- 14.25	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
11 6 59	32.0	...	...	8. Instrument in meridian, observation at II with movable thread.	1	36 22 21.32	.....
7 15	32.0	...	...	10. Instrument in meridian, observation at II between fixed thread and movable at 24.727 rev.	2	20.90	.....
7 24	31.7	33.3	30.101	11. Instrument in meridian, observation at IX with movable thread.	3	19.02	-27.76
12 18 51	45.9	48.7	30.166		4	19.25	.....
19 7	45.7	...	...		5	20.12	.....
19 24	44.6	47.4	30.168		6	19.00	-27.76
6 51	36.0	37.7	30.264		7	19.66	.....
7 9	35.3	...	...		8	19.19	-26.38
7 15	34.8	...	...		9	19.51	-11.36
7 19	34.6	...	...		10	19.61	-26.86
7 33	...	36.3	30.278		11	19.22	-25.86
15 19 39	64.0	66.1	29.967		12	19.30	.....
19 53	63.8	...	...		13	19.10	.....
19 58	61.6	...	...		14	18.98	- 9.23
20 4	61.3	...	...		15	18.46	-11.53
20 24	62.6	...	...		16	18.10	-28.91
20 41	62.1	...	...		17	18.78	.....
20 47	61.6	...	...		18	18.36	.....
20 53	61.3	63.7	29.960				
21 1	60.6	...	...		
21 11	60.4	...	...	Note.			
21 21	60.0	...	...	2. Very faint.			
21 27	59.9	...	...		
21 34	59.6	...	...		
21 41	59.5	...	...		
21 48	59.2	...	...		

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	2 Lacertæ	W	2.5	22 17	....	49.95	52.50	....	43 28 23.48	+ 1.87	- 0.35	+ 7.15	+46 4 13.35
	October 23, L.	E	....	....	....	48.05	50.75	....	29 10 45.88	+ 0.01	+ 0.35	- 7.15	
2	δ Cygni	E	2.5	19 42	....	50.00	50.20	24.404	30 23 28.50	+ 2.52	+ 0.22	- 5.89	+44 54 30.81
		W	....	....	....	48.90	49.15	24.404	42 21 46.20	+ 1.43	- 0.22	+ 5.89	
3	δ ² Cygni	W	3	20 6	....	48.20	49.20	24.668	34 1 27.82	- 0.23	- 0.25	- 2.31	+36 34 12.82
		E	....	....	....	50.40	50.90	24.668	38 43 28.72	+ 1.77	+ 0.25	+ 2.31	
4	ω ¹ Cygni	E	2.5	20 27	....	50.45	50.80	24.378	26 39 26.52	+ 3.05	+ 0.25	- 9.66	+48 38 36.39
		W	....	....	....	48.90	49.45	24.378	46 5 48.28	+ 1.59	- 0.25	+ 9.66	
5	φ Capricorni	W	4	20 37 46.0	2 48.6	48.00	48.75	....	331 52 26.00	+ 0.12	+12.05	-1 57.78	-25 36 22.72
		E	....	20 43 22.0	2 47.4	50.35	50.85	....	100 52 11.15	+ 2.39	-11.88	+1 57.83	
6	32 Vulpeculæ	E	2.5	20 47 48.2	2 47.5	49.80	50.20	....	47 35 50.75	+ 1.86	-54.15	+ 11.22	+27 42 25.73
		W	....	20 53 24.7	2 49.0	49.75	50.10	....	25 8 41.85	+ 1.72	+55.13	- 11.22	
7	θ Capricorni	W	3	20 58 12.0	2 30.6	48.90	49.55	....	339 52 6.20	+ 0.98	+11.00	-1 25.21	-17 36 10.73
		E	....	21 3 9.0	2 26.4	49.80	50.10	....	92 52 31.50	+ 1.75	-10.40	+1 25.24	
8	4 Piscis Australis	E	3.5	21 9 32.0	2 45.3	50.00	50.40	....	107 48 44.20	+ 2.01	-10.30	+2 46.77	-32 33 46.69
		W	....	21 14 54.0	2 36.7	50.00	50.45	....	324 55 51.10	+ 2.09	+ 9.26	-2 46.82	
9	g Cygni	W	2	21 26	....	49.20	49.80	28.687	43 32 23.22	+ 0.70	- 0.22	+ 7.16	+46 8 3.12
		E	....	....	....	49.95	50.50	28.687	29 7 3.75	+ 1.47	+ 0.22	- 7.16	
10	13 H. Cephei	W	2.5	21 33 7.0	2 58.7	49.80	50.45	....	54 31 25.18	+ 1.97	-23.64	+ 18.58	+57 4 19.55
		E	....	21 38 47.0	2 41.3	49.85	50.05	....	18 13 13.90	+ 2.08	+19.26	- 18.58	
11	μ Capricorni	E	3	21 45 38.0	2 35.4	49.80	50.50	....	89 15 57.02	+ 1.92	-12.46	+1 14.78	-13 59 24.88
	October 26, L.	W	....	21 50 34.0	2 20.6	50.00	50.75	....	343 28 40.28	+ 2.17	+10.21	-1 14.82	
12	ω ¹ Cygni	W	2.5	20 27	....	51.05	50.35	24.521	46 5 42.58	+ 0.92	- 0.38	+ 9.77	+48 38 36.36
		E	....	....	....	49.65	49.15	24.521	26 39 23.05	- 0.43	+ 0.38	- 9.77	
13	δ Delphini	E	2.5	20 36 20.0	2 47.0	49.70	49.15	....	60 33 1.72	+ 0.32	-27.95	+ 25.63	+14 44 35.79
		W	....	20 41 41.0	2 34.0	51.05	50.30	....	12 11 37.90	+ 1.62	+23.77	- 25.65	
14	32 Vulpeculæ	W	2.5	20 47 48.5	2 47.6	50.50	49.95	....	25 8 43.05	+ 1.13	+54.23	- 11.35	+27 42 25.18
		E	....	20 53 23.5	2 47.4	49.95	49.15	....	47 35 52.65	+ 0.44	-54.09	+ 11.36	
15	61 Cygni (1st star)	E	1.5	21 3	....	50.10	49.30	24.023	37 0 26.10	+ 1.33	+ 0.26	+ 0.63	+38 17 43.31
		W	....	....	....	51.15	50.55	24.023	35 45 19.65	+ 2.51	- 0.26	- 0.63	
16	4 Piscis Australis	W	3	21 9 26.0	2 51.6	50.55	50.05	....	324 55 51.28	+ 1.23	+11.11	-2 48.83	-32 33 46.79
		E	....	21 15 4.0	2 46.4	50.00	49.15	....	107 48 43.10	+ 0.47	-10.44	+2 48.90	
17	g Cygni	E	1.5	21 26	....	50.05	49.20	28.681	29 7 3.22	+ 1.11	+ 0.22	- 7.25	+46 8 3.21
		W	....	....	....	51.30	50.45	28.681	43 32 20.65	+ 2.39	- 0.22	+ 7.25	
18	4 Piscis Australis	W	3.5	21 36 46.0	2 38.3	50.60	50.00	....	324 2 40.62	+ 1.21	+ 0.31	-2 57.90	-33 27 8.67
		E	....	21 42 4.0	2 39.7	49.65	49.05	....	108 41 55.55	+ 0.23	- 0.47	+2 57.94	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>°</i>	<i>"</i>
15 23 1	58.7			2.4.17. Instrument in meridian, observation at II with movable thread	1	36 22	-26.79
22 8	58.9	61.1	29.956	3.1.12. Instrument in meridian, observation at IX with movable thread	2	19.68	
22 18	58.6			9. Instrument in meridian, observation at VIII with movable thread.	3	20.18	-27.08
23 19 41	65.2	67.7	29.890	15. Instrument in meridian, observation at I with movable thread.	4	19.01	-29.50
20 4	64.1				5	19.94	
20 15	62.8				6	18.48	
20 40	62.2				7	20.53	
20 48	61.9				8	19.16	
21 1	61.6				9	19.81	-29.16
21 11	61.4	63.7	29.894		10	19.18	-30.26
21 24	61.0				11	19.55	
21 16	60.7				12	18.10	-29.50
21 46	60.6				13	18.68	-27.28
21 51	60.3				14	18.71	
22 0	60.3				15	19.60	
22 4		62.3	29.896		16	18.41	
20 28	55.1	57.8	29.790		17	18.70	-29.55
20 19	54.7				18	18.74	-27.11
20 51	54.9						
21 1	54.8						
21 10	54.5	56.4	29.775				
21 15	54.1						
21 24	53.2						
21 19	52.9						
21 43	52.8						
21 51	52.9						

Notes.
1. No micrometer record.
12. Micrometer recording decreased 1 rev.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	28 Pegasi	E W	2.5 ...	22 3 28.7 22 8 38.5	2 38.7 2 31.1	52.40 51.70	50.00 49.30	..... .....	54 46 23.78 17 58 13.35	+ 1.40 + 0.67	-31.71 +28.75	+ 19.60 - 19.60	+20 31 21.88
2	3 Lacertæ	W E	2.5 ...	22 17 13.0 22 22 40.5	2 43.0 2 44.5	51.60 52.45	49.10 50.00	..... .....	49 13 15.05 23 31 17.70	+ 0.58 + 1.47	-31.38 +31.96	+ 13.43 - 13.43	+51 45 57.12
3	143 B. Camelop. October 30, L.	W E	3 ...	7 20 28.0 7 24 38.0	0 44.2 3 25.8	52.15 52.35	49.25 49.50	..... .....	66 5 34.05 6 38 46.85	+ 0.23 + 0.41	- 0.61 +13.19	+ 33.74 - 33.74	+68 39 7.18
4	ε Draconis	W E	2.5 ...	19 45 40.0 19 51 19.0	2 51.2 2 47.8	51.85 51.00	50.40 49.55	..... .....	67 28 44.70 5 15 49.10	+ 1.54 + 0.71	- 8.22 + 7.89	+ 34.73 - 34.73	+70 2 11.73
5	3 H. Ursæ Majoris s. p.	E W	4 ...	20 1 12.0 20 5 52.0	2 21.0 2 19.0	50.55 51.85	48.80 50.00	..... .....	324 5 17.92 108 39 17.30	+ 0.07 + 1.36	- 3.21 + 3.12	-2 58.42 +2 58.43	+68 44 41.24
6	κ Cephei	W E	2.5 ...	20 10 3.0 20 14 30.0	2 2.1 2 24.9	51.95 51.20	50.15 49.55	..... .....	74 52 29.80 357 52 4.18	+ 1.46 + 0.74	- 2.21 + 3.11	+ 45.85 - 45.87	+77 26 13.21
7	Groombridge 1418 s. p.	E W	3 ...	20 24 38.0 20 31 0.0	2 29.8 3 52.2	50.80 51.65	49.00 50.00	..... .....	340 41 43.82 92 2 40.25	+ 0.33 + 1.23	- 0.93 + 2.23	-1 24.35 +1 24.31	+85 22 48.58
8	γ Delphini	W E	2.5 ...	20 40 7.0 20 45 4.0	2 14.2 2 42.8	51.55 51.45	49.85 49.90	..... .....	13 14 36.35 59 30 8.58	+ 1.10 + 1.06	+18.72 -27.55	- 24.65 + 24.66	+15 47 29.22
9	ρ Ursæ Majoris s. p.	E W	4.5 ...	20 51 16.0 20 56 44.0	2 52.7 2 35.3	51.10 51.80	49.15 50.15	..... .....	323 20 8.58 109 24 27.60	+ 0.50 + 1.38	- 4.06 + 4.01	-3 7.27 +3 7.42	+67 59 21.38
10	α Cygni November 1, L.	W E	3 ...	21 14 ..... .....	..... .....	51.65 51.45	50.00 49.45	28.033 28.033	36 25 23.70 36 14 56.62	+ 0.53 + 0.13	- 0.27 + 0.27	+ 0.09 - 0.09	+39 0 30.40
11	173 B. Camelop. s. p.	W E	3 ...	20 5 8.0 20 10 28.0	2 43.5 2 36.5	50.00 48.85	50.15 49.10	..... .....	101 22 35.75 331 21 58.25	+ 1.06 + 0.88	+ 3.02 - 2.77	+2 6.81 -2 6.85	+76 2 14.14
12	212 H ¹ . Draconis	E W	2.5 ...	20 28 6.0 20 32 38.0	2 21.6 2 10.4	48.30 49.70	48.60 50.35	..... .....	3 4 50.95 69 39 43.58	+ 0.31 + 1.95	+ 4.73 - 4.01	- 39.03 + 39.04	+72 13 18.64
13	δ Delphini	W E	3 ...	20 36 33.5 20 42 19.7	2 34.5 3 11.7	49.80 48.55	50.35 49.35	..... .....	12 11 39.25 60 33 10.62	+ 1.09 + 0.83	+23.92 -36.82	- 26.71 + 26.72	+14 44 35.39
14	76 Draconis	E W	3 ...	20 47 8.0 20 52 36.0	2 20.1 3 7.9	48.35 49.95	48.65 50.35	..... .....	353 6 57.92 79 37 38.48	+ 0.36 + 2.07	+ 1.65 - 2.97	- 55.96 + 55.95	+82 11 31.62
15	61 Cygni (1st star)	W E	2.5 ...	21 3 ..... .....	..... .....	49.95 48.60	50.50 49.00	24.154 24.154	35 45 15.75 37 0 21.70	+ 1.41 - 0.08	- 0.26 + 0.26	- 0.65 + 0.65	+38 17 43.70
16	α Cygni	E W	2.5 ...	21 14 ..... .....	..... .....	48.40 49.65	48.85 49.95	28.097 28.097	36 14 54.52 36 25 19.72	+ 0.78 + 2.61	+ 0.04 - 0.42	- 0.09 + 0.09	+39 0 30.22
17	358 B. Cygni	E W	2.5 ...	21 25 38.5 21 31 10.5	2 43.5 2 48.5	48.40 49.80	48.85 50.10	..... .....	23 4 31.85 49 40 6.45	+ 0.48 + 1.82	+30.22 -32.09	- 14.06 + 14.07	+52 12 47.72
18	κ Pegasi	W E	2.5 ...	21 37 42.5 21 43 9.0	2 44.9 2 41.6	49.50 49.05	49.80 49.55	..... .....	39 42.72 50 4 51.80	+ 1.56 + 1.18	+44.06 -42.31	- 14.54 + 14.54	+25 13 11.14
19	28 Aquarii	W E	3 ...	21 53 30.0 21 59 5.0	2 50.8 2 44.2	49.45 49.15	40.85 49.70	..... .....	357 36 58.48 75 7 34.55	+ 1.54 + 1.33	+19.77 -18.27	- 47.86 + 47.87	+ 0 0 30.06

Time.	Ther. 3882	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1906.0
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm</i>						<i>° ' "</i>	<i>"</i>
29 22 6	41.3		29.875	Instrument in meridian, observation between fixed thread and movable at 25 140 rev				1	16 23 18.12	-24.17
22 27	41.7	41.6	29.875	Instrument in meridian, observation at IX with movable thread				2	17.99	
2 18	38.9		29.816	Instrument in meridian; E. observation at III; W. observation at I + 6° with movable thread.				3	17.06	
7 26	38.9	40.7	29.816					4	17.86	
10 19 46	52.7		29.868					5	18.28	
19 52	52.7	51.9	29.868					6	18.51	
20 2	51.9							7	18.66	+ 29.35
20 6	51.9							8	19.14	- 22.46
20 13	51.6							9	18.61	+ 26.08
20 25	51.1							10	19.04	
20 34	51.1							11	18.52	
20 41	51.2							12	18.70	
20 52	50.1							13	19.00	- 22.01
20 57	49.9							14	18.75	
21 12	50.0	51.9	29.868					15	19.51	
21 20	42.1							16	19.80	
20 11	42.0	41.9	30.174	Notes				17	19.17	-30.64
20 29	41.6			1 Poor, clouds.				18	19.50	-25.54
20 37	41.1			7 Very faint				19	18.70	-18.25
20 45	41.2			9 Clouds.				20		
21 1	41.1									
21 12	41.7	42.9	30.168							
21 29	41.1									
21 41	41.6									

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	λ Cephei	E	3	22 5 26.0	2 58.0	49.15	49.70	.....	16 20 3.82	+ 1.28	+20.23	- 21.77	+58 57 32.44
		W	...	22 11 9.0	2 45.0	49.95	50.00	.....	56 24 28.52	+ 1.86	-17.39	+ 21.77	
2	π Aquarii	W	2.5	22 17 35.0	2 57.9	49.55	49.90	.....	358 21 45.58	+ 1.65	+21.81	- 46.63	+ 0 54 19.32
		E	...	22 23 1.0	2 28.1	49.50	49.90	.....	74 22 44.35	+ 1.58	-15.11	+ 46.62	
3	υ Aquarii	E	3.5	22 26 48.0	2 49.6	49.65	49.95	.....	96 27 14.82	+ 1.70	-13.13	+1 43.44	-21 11 11.60
		W	...	22 32 18.0	2 40.4	49.85	50.05	.....	336 17 19.80	+ 1.86	+11.74	-1 43.44	
4	τ Aquarii	W	3.5	22 41 43.0	2 58.4	49.45	49.90	.....	343 22 59.28	+ 1.57	+16.40	-1 19.03	-14 5 5.07
		E	...	22 47 14.0	2 32.6	49.25	49.90	.....	89 21 33.48	+ 1.48	-11.99	+1 19.07	
5	52 Pegasi	E	3	22 52 7.0	2 27.2	49.40	50.00	.....	64 3 26.78	+ 1.61	-19.41	+ 31.34	+11 13 55.58
		W	...	22 57 9.0	2 34.8	50.00	50.05	.....	8 41 5.78	+ 1.93	+21.47	- 31.37	
6	59 Pegasi	W	2.5	23 4 13.0	2 51.0	49.55	49.60	.....	5 40 7.95	+ 1.44	+24.05	- 35.51	+ 8 12 55.16
		E	...	23 9 47.0	2 43.0	49.75	50.20	.....	67 4 25.80	+ 1.85	-21.86	+ 35.51	
7	4 Cassiopeiae	E	3	23 17 49.0	2 56.4	49.90	50.40	.....	13 31 16.48	+ 2.06	+16.08	- 25.21	+61 46 27.08
		W	...	23 23 29.0	2 43.6	49.90	49.70	.....	59 13 16.80	+ 1.71	-13.83	+ 25.20	
8	μ Sculptoris	W	4	23 33 6.0	2 40.8	51.40	49.65	.....	324 54 23.82	+ 2.43	+ 9.75	-2 56.64	-32 35 24.40
		E	...	23 38 44.0	2 57.2	51.50	49.85	.....	107 50 14.40	+ 2.59	-11.84	+2 56.70	
9	ε Draconis s. P.	E	4	7 45 40.0	2 51.4	51.15	49.15	.....	325 22 46.85	+ 0.75	- 4.50	-2 53.82	+70 2 13.46
		W	...	7 51 30.0	2 58.6	51.65	49.70	.....	107 21 48.60	+ 1.32	+ 4.89	+2 53.88	
10	3 H. Ursae Majoris	W	3	8 1 3.0	2 30.6	51.95	49.80	.....	66 11 11.58	+ 1.50	- 7.02	+ 34.64	+68 44 38.96
		E	...	8 5 58.0	2 24.4	51.30	49.25	.....	6 33 23.78	+ 0.89	+ 6.45	- 34.65	
11	κ Cephei s. P.	E	3.5	8 9 50.0	2 15.2	51.00	48.85	.....	332 45 53.25	+ 0.54	- 1.88	-2 1.32	+77 26 14.99
		W	...	8 14 40.0	2 34.8	51.75	49.65	.....	99 58 41.85	+ 1.30	+ 2.47	+2 1.31	
12	Groombridge 1418	W	2.5	8 24 25.0	2 43.9	52.10	50.05	.....	82 48 39.28	+ 1.68	- 1.27	+1 3.55	+85 22 46.96
		E	...	8 30 0.0	2 51.1	51.35	49.25	.....	349 55 44.25	+ 0.94	+ 1.38	-1 3.56	
13	ρ Ursae Majoris	E	2.5	8 50 25.0	3 44.2	50.80	48.70	.....	7 18 31.28	+ 0.32	+16.45	- 33.64	+67 59 20.88
		W	...	8 55 20.0	1 10.8	51.50	49.55	.....	65 25 49.32	+ 1.16	- 1.64	+ 33.64	
14	σ ² Ursae Majoris	W	2.5	8 59 45.0	2 27.2	51.70	49.60	.....	64 57 6.55	+ 1.27	- 7.35	+ 32.95	+67 30 32.38
		E	...	9 4 43.0	2 30.8	51.25	49.10	.....	7 47 26.80	+ 0.79	+ 7.71	- 32.95	
15	ι H. Draconis	E	2.5	9 21 6.0	2 42.1	51.25	48.75	.....	353 34 19.42	+ 0.57	+ 2.36	- 55.99	+81 44 3.96
	Nov. 2, L.	W	...	9 26 20.0	2 31.9	51.50	49.40	.....	79 10 5.68	+ 1.02	- 2.07	+ 55.98	
16	173 B. Camelop. s. P.	E	4	20 5 10.0	2 41.6	50.95	50.05	.....	331 21 56.48	+ 1.45	- 2.95	-2 3.63	+76 2 15.22
		W	...	20 10 36.0	2 44.4	50.35	49.60	.....	101 22 39.62	+ 0.86	+ 3.05	+2 3.69	
17	212 H ¹ . Draconis	W	3	20 27 39.0	2 48.5	50.50	49.80	.....	69 39 47.65	+ 1.08	- 6.70	+ 38.05	+72 13 18.66
		E	...	20 33 18.0	2 50.5	50.95	50.15	.....	3 4 46.15	+ 1.47	+ 6.86	- 38.05	
18	76 Draconis	W	3	20 46 30.0	2 57.9	50.15	49.50	.....	79 37 40.75	+ 0.75	- 2.66	+ 54.56	+82 11 31.98
		E	...	20 52 22.0	2 54.1	50.50	49.60	.....	353 6 54.20	+ 0.95	+ 2.55	- 54.59	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
1 21 54	40.2	42.3	30.174	12, 15. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.				1	36 22 19.16	-30.72
22 8	39.0	...	...					2	19.92	.....
22 20	39.0	...	...					3	18.40	-11.45
22 27	39.8	...	...					4	20.13	-13.80
22 33	39.8	...	...					5	19.06	-21.09
22 42	40.1	...	...					6	19.62	-20.07
22 51	39.6	...	...					7	19.64	.....
22 56	39.3	...	...					8	20.60	- 8.73
23 7	38.8	...	...					9	18.98	.....
23 21	39.2	...	...					10	18.58	.....
23 34	39.2	...	...					11	18.76	.....
23 38	39.1	...	30.181					12	18.52	+20.51
7 45	33.5	35.0	30.129					13	18.44	+26.89
7 58	33.1	...	...					14	17.88	.....
8 4	33.0	...	...					15	18.88	.....
8 10	33.1	...	...					16	19.28	.....
8 15	33.1	...	...					17	18.26	.....
8 30	32.8	34.2	30.122					18	18.26	.....
8 51	32.4	...	...					
9 1	32.7	...	...					
9 5	32.7	...	...					
9 22	32.8	...	...					
9 26	32.9	33.9	30.121							
2 20 4	52.3	54.0	30.046							
20 13	51.9	...	...					
20 30	51.9	...	...					
20 36	51.9	...	...					

Note.
12. Paint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	σ^2 Ursæ Majoris S. P.	E W	4.5 ...	20 59 20.0 21 4 36.0	2 52.3 2 23.7	49.95 49.95	49.40 49.50	..... .....	322 51 28.00 109 53 8.85	+ 0.59 + 0.62	- 5.02 + 3.49	-3 13.91 +3 13.85	+67 30 34.58
2	σ Cygni	E W	2 ...	21 14 ..... .....	..... .....	50.20 50.15	49.45 49.40	28.060 28.060	36 14 55.52 36 25 22.45	+ 1.30 + 1.27	+ 0.17 - 0.17	- 0.09 + 0.09	+39 0 30.21
3	ϵ H. Draconis S. P.	W E	4.5 ...	21 21 4.0 21 26 30.0	2 44.2 2 41.8	50.15 50.05	49.60 49.45	..... .....	95 41 17.02 337 3 18.88	+ 0.79 + 0.60	+ 1.91 - 1.86	+1 37.79 -1 37.67	+81 44 4.41
4	κ Pegasi	E W	2.5 ...	21 37 34.0 21 43 6.3	2 53.4 2 38.9	49.95 50.35	49.10 49.65	..... .....	50 4 58.12 22 39 45.62	+ 0.41 + 0.94	-48.71 +40.91	+ 14.18 - 14.18	+25 13 11.48
5	ϵ Draconis S. P.	W E	4 ...	7 45 34.0 7 51 26.0	2 57.4 2 54.6	50.80 49.65	49.55 48.20	..... .....	107 21 52.00 325 22 46.18	+ 1.97 + 0.72	+ 4.82 - 4.67	+2 51.09 -2 51.11	+70 2 13.78
6	3 H. Ursæ Majoris	E W	3 ...	8 1 2.0 8 6 5.0	2 31.7 2 31.3	49.45 51.10	48.20 49.65	..... .....	6 33 24.72 66 11 13.30	+ 0.63 + 2.22	+ 7.12 - 7.08	- 34.10 + 34.12	+68 44 38.94
7	κ Cephei S. P.	W E	4 ...	8 10 18.0 8 15 8.0	1 47.1 3 2.9	51.25 49.70	49.75 48.25	..... .....	99 58 45.92 332 45 53.88	+ 2.33 + 0.81	+ 1.18 - 3.44	+1 59.56 -1 59.64	+77 26 14.47
8	Groombridge 1418	E W	2.5 ...	8 24 40.0 8 30 50.0	2 29.3 3 40.7	49.50 51.50	48.05 50.00	..... .....	349 55 45.22 82 48 40.28	+ 0.60 + 2.58	+ 1.05 - 2.30	-1 2.65 +1 2.69	+85 22 46.36
9	ρ Ursæ Majoris	W E	2.5 ...	8 51 10.0 8 56 4.0	2 59.4 1 54.6	51.50 49.65	49.80 48.25	..... .....	65 25 56.75 7 18 43.12	+ 2.46 + 0.75	-10.53 + 4.30	+ 33.19 - 33.20	+67 59 20.29
10	σ^2 Ursæ Majoris	E W	2.5 ...	8 59 49.0 9 4 45.0	2 23.4 2 32.6	49.50 51.40	47.85 49.80	..... .....	7 47 28.78 64 57 7.20	+ 0.49 + 2.44	+ 6.98 - 7.90	- 32.56 + 32.56	+67 30 32.14
11	ϵ H. Draconis	W E	3 ...	9 21 2.0 9 26 26.0	2 46.4 2 37.6	51.35 50.15	49.80 48.50	..... .....	79 10 11.60 353 34 25.88	+ 2.39 + 1.12	- 2.48 + 2.23	+ 55.25 - 55.22	+81 44 3.22
12	ν Cygni	E W	2.5 ...	20 54 ..... .....	..... .....	50.10 48.95	49.95 48.70	23.994 23.994	34 29 25.68 38 16 22.30	+ 2.37 + 1.10	+ 0.19 - 0.19	- 1.90 + 1.90	+40 48 46.22
13	α Aquarii	E W	3 ...	21 58 3.0 22 3 31.0	2 58.7 2 29.3	50.20 50.00	49.75 49.55	..... .....	76 3 26.35 356 41 16.12	+ 1.74 + 1.53	-21.21 +14.81	+ 48.10 - 48.08	- 0 46 18.46
14	σ^2 Ursæ Majoris S. P.	W E	3 ...	20 59 12.0 21 4 56.0	3 0.6 2 43.4	50.90 49.60	50.40 49.00	..... .....	109 53 7.78 322 51 28.10	+ 1.96 + 0.60	+ 5.52 - 4.52	+3 14.37 -3 14.47	+67 30 33.20
15	ν Cygni	E W	2.5 ...	21 14 ..... .....	..... .....	49.55 50.60	49.05 50.40	22.035 22.035	40 48 50.90 31 59 35.82	+ 1.15 + 2.40	+ 0.15 - 0.15	+ 4.50 - 4.50	+34 30 35.28
16	ϵ H. Draconis S. P.	E W	3 ...	21 21 4.0 21 26 26.0	2 44.7 2 37.3	49.40 50.95	49.00 50.50	..... .....	337 3 20.28 95 41 15.40	+ 0.49 + 2.05	- 1.92 + 1.75	-1 38.00 +1 38.11	+81 44 4.93
17	173 B. Camelop.	E W	2.5 ...	8 4 54.0 8 10 52.0	2 58.1 2 59.9	49.50 50.60	48.50 49.70	..... .....	359 16 2.32 73 28 34.82	+ 0.51 + 1.71	+ 5.38 - 5.49	- 44.91 + 44.95	+76 2 13.18

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1900.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	
2 20 47	51.3	53.1	30.046	2, 12, 15. Instrument in meridian, observation at II with movable thread.	1	36 22 18.24	
20 51	51.1	...	...	8. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	2	19.92	
21 0	50.6	...	...		3	18.76	
21 5	50.8	...	...		4	18.64	-25.57
21 14	49.9	...	...		5	20.50	
21 22	49.0	...	...		6	20.46	
21 27	50.6	...	...		7	20.10	
21 42	50.7	...	...		8	19.12	+29.67
2 45	40.1	41.4	30.076		9	18.41	+27.02
2 52	40.0	...	...		10	19.00	
3 4	19.6	...	...		11	20.18	
3 15	18.8	...	...		12	19.34	
3 25	18.7	...	...		13	19.68	
3 41	18.4	41.1	30.076		14	19.07	
3 44	17.9	...	...		15	18.76	-27.75
3 0	17.6	...	...		16	19.08	
3 5	17.6	...	...		17	19.64	
3 21	18.1	...	...		
3 26	18.6	39.7	30.080				
3 20 12	55.4	57.0	30.102				
21 12	56.1	...	...		
21 18	52.7	...	...		
21 4	52.9	...	...		
21 11	54.1	54.1	30.104	Notes.			
4 20 19	50.6	51.3	30.116	8. Very faint.			
21 9	50.2	...	...	11. Clouds.			
21 21	50.0	...	...		
21 26	49.5	51.9	30.115				
3 4	40.1	42.0	30.019				
3 11	19.6	...	...		

No.	Date, observer, and object.	Circ.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	212 H ¹ . Draconis S. P.	W E	3 ...	8 27 28.0 8 33 14.0	2 59.6 2 46.4	50.65 49.80	49.60 48.80	..... .....	105 10 58.68 327 33 26.50	+ 1.70 + 0.87	+ 4.48 - 3.85	+2 32.23 -2 32.22	+72 13 20.26
2	76 Draconis S. P.	E W	3 ...	8 47 6.0 8 52 26.0	2 21.6 2 58.4	49.45 50.70	48.55 49.75	..... .....	337 30 43.45 95 13 41.58	+ 0.54 + 1.82	- 1.35 + 2.15	-1 38.05 +1 38.12	+82 11 33.62
3	<i>d</i> Ursæ Majoris	E W	2.5 ...	9 23 55.0 9 29 23.0	2 20.2 3 7.8	49.70 50.60	48.60 49.55	..... .....	5 3 52.68 67 40 39.00	+ 0.73 + 1.64	+ 5.43 - 9.74	- 36.20 + 36.23	+70 14 9.08
4	November 5, L. Cygni	W E	2.5 ...	20 54 ..... .....	..... .....	49.70 50.60	49.00 49.85	24.057 24.057	38 16 20.38 34 29 23.55	- 0.44 + 0.50	- 0.19 - 0.19	+ 1.91 - 1.91	+40 48 46.50
5	<i>v</i> Cygni	W E	2.5 ...	21 14 ..... .....	..... .....	49.55 50.70	49.00 49.65	26.726 26.726	31 56 26.78 40 45 42.00	- 0.51 + 0.15	- 0.15 + 0.15	- 4.47 + 4.47	+34 30 34.28
6	π^2 Cygni	E W	3 ...	21 43 ..... .....	..... .....	50.35 49.80	50.00 49.25	23.882 23.882	26 25 27.35 46 20 29.35	+ 1.62 + 0.90	+ 0.25 - 0.25	- 10.19 + 10.19	+48 52 57.42
7	173 B. Camelop.	W E	3 ...	8 5 1.0 8 10 33.0	2 51.3 2 40.7	49.80 50.50	49.30 49.65	..... .....	73 28 36.50 359 16 0.70	+ 0.42 + 0.95	- 4.98 + 4.38	+ 44.31 - 44.35	+76 2 14.12
8	212 H ¹ . Draconis S. P.	E W	4 ...	8 27 36.0 8 33 24.0	2 51.6 2 56.4	50.25 50.40	49.50 49.50	..... .....	327 33 29.40 105 11 6.35	+ 0.78 + 0.85	- 4.09 + 4.32	-2 30.40 +2 30.63	+72 13 19.93
9	76 Draconis S. P.	W E	3.5 ...	8 46 40.0 8 52 21.0	2 47.6 2 53.4	49.90 50.45	49.35 49.60	..... .....	95 13 49.88 337 30 48.22	+ 0.53 + 0.92	+ 1.89 - 2.03	+1 37.08 -1 37.08	+82 11 33.48
10	<i>d</i> Ursæ Majoris	E W	3 ...	9 23 9.0 9 28 28.0	3 6.4 2 12.6	50.20 50.00	49.70 49.15	..... .....	5 3 52.48 67 40 39.98	+ 0.87 + 0.46	+ 9.59 - 4.85	- 35.83 + 35.82	+70 14 8.99
11	November 6, L. <i>d</i> Ursæ Majoris S. P.	W E	4 ...	21 23 25.0 21 28 46.0	2 50.5 2 30.5	49.75 50.50	49.15 50.05	..... .....	107 10 0.95 325 34 33.28	+ 0.76 + 1.62	+ 4.42 - 3.44	+2 45.04 -2 44.97	+70 14 10.82
12	κ Capricorni	E W	3.5 ...	21 34 40.0 21 40 12.0	2 49.1 2 42.9	50.65 49.65	50.05 49.05	..... .....	94 33 44.40 338 10 52.72	+ 1.71 + 0.67	-13.48 +12.50	+1 33.27 -1 33.33	-19 17 29.83
13	16 Pegasi	W E	3 ...	21 46 4.3 21 51 36.3	2 47.3 2 44.7	49.25 50.70	48.60 50.15	..... .....	22 55 53.18 49 48 41.35	+ 0.25 + 1.77	+46.13 -44.71	- 13.88 + 13.88	+25 29 23.54
14	<i>o</i> Aquarii	E W	3 ...	21 55 36.5 22 1 7.0	2 55.3 2 35.2	50.85 50.00	50.25 49.60	..... .....	77 53 18.48 354 51 21.52	+ 1.92 + 1.14	-19.65 +15.40	+ 51.37 - 51.36	- 2 36 15.87
15	λ Piscis Australis	W E	4 ...	22 6 18.0 22 11 34.0	2 45.9 2 30.1	49.55 50.75	49.10 50.30	..... .....	329 15 16.72 103 29 15.48	+ 0.66 + 1.88	+11.16 - 9.14	-2 16.68 +2 16.69	-28 13 49.68
16	π Aquarii	E W	3.5 ...	22 17 45.0 22 23 10.0	2 48.3 2 36.7	51.20 50.40	50.40 49.65	..... .....	74 22 49.50 358 21 49.08	+ 2.16 + 1.38	-19.52 +16.92	+ 45.35 - 45.34	+ 0 54 19.12
17	49 G. Piscis Australis	W E	4 ...	22 30 38.0 22 36 15.0	2 59.8 2 37.2	49.75 51.35	49.30 50.50	..... .....	323 55 42.92 108 48 46.68	+ 0.86 + 2.29	+11.98 - 9.16	-3 1.46 +3 1.45	-33 34 6.64

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
4 8 28	39.6	.....	.....	1. 2. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	1	36 22 19.58	.....
8 37	39.6	.....	.....	3. Instrument in meridian, observation assumed as between fixed thread and movable at 25.150 rev.	2	19.52	.....
8 48	39.7	.....	.....		3	20.28	.....
8 56	39.1	41.4	30.020	4. 5. Instrument in meridian, observation at VIII with movable thread.	4	18.18	.....
9 8	39.1	.....	.....	6. Instrument in meridian, observation at II with movable thread.	5	19.38	-27.76
9 24	38.6	.....	.....		6	18.65	.....
9 30	38.2	40.7	30.018		7	18.96	.....
5 20 52	50.6	51.7	29.910		8	18.92	.....
21 12	50.2	.....	.....		9	19.70	.....
21 41	49.3	.....	.....		10	19.26	.....
22 0	49.1	50.7	29.896		11	18.83	.....
8 5	44.5	.....	.....		12	19.23	-11.22
8 11	44.0	45.1	29.906		13	18.98	.....
8 28	43.5	.....	.....		14	19.41	-17.21
8 34	42.7	.....	.....		15	18.38	- 8.49
8 47	42.7	.....	.....		16	19.76	.....
8 53	42.7	.....	.....		17	17.78	- 7.03
9 23	42.0	.....	.....		
9 28	42.1	43.4	29.916				
6 21 24	49.6	.....	.....		
21 29	49.8	51.1	29.924				
21 35	49.6	.....	.....		
21 40	49.3	.....	.....		
21 49	49.3	.....	.....		
21 58	49.1	.....	.....		
22 7	49.3	.....	.....	Notes.			
22 12	49.2	.....	.....	1. 2. Very faint; clouds.			
22 20	49.3	.....	.....	4. 6. Thick haze.			
22 27	.....	50.7	29.920	5. Faint; haze.			
22 31	49.2	.....	.....		

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	7 Piscis Australis	E W	4	22 44 36.0 22 50 10.0	2 47.0 2 47.0	51.50 50.50	50.85 49.85	..... .....	108 37 1.58 324 7 30.20	+ 2.54 + 1.53	-10.38 +10.38	+2 59.23 -2 59.21	-33 22 18.20
2	β Piscium	W E	3-5	22 56 16.0 23 1 46.0	2 54.5 2 35.5	50.05 51.40	49.45 50.80	..... .....	0 46 30.25 71 58 1.20	+ 1.09 + 2.46	+22.16 -17.60	- 41.51 + 41.55	+ 3 19 9.03
3	5 H ¹ . Cassiopeiae	E W	3-5	23 6 4.0 23 11 36.0	2 47.2 2 44.8	51.40 50.90	50.70 50.00	..... .....	18 38 2.82 54 6 28.75	+ 2.40 + 1.81	+21.40 -20.80	- 18.61 + 18.62	+56 39 27.02
4	4 Cassiopeiae	W E	3-5	23 17 54.0 23 23 21.0	2 51.7 2 35.3	50.70 51.10	49.95 50.50	..... .....	59 13 20.02 13 31 17.15	+ 1.68 + 2.17	-15.23 +12.46	+ 24.52 - 24.53	+61 46 28.71
5	248 G. Aquarii	E W	4	23 27 53.0 23 33 22.0	2 53.2 2 35.8	51.05 51.05	50.50 50.40	..... .....	83 15 38.40 349 28 58.58	+ 2.14 + 2.09	-17.26 +13.97	+1 2.17 -1 2.20	- 7 58 49.66
6	ψ Andromedæ	W E	2-5	23 41 ..... .....	..... .....	51.05 51.20	50.25 50.65	26.107 26.107	43 20 25.20 29 22 30.85	+ 1.43 + 1.41	- 0.22 + 0.50	+ 7.15 - 7.15	+45 54 20.82
7	November 7, L. d Ursæ Majoris s. P.	E W	4	21 23 26.0 21 28 50.0	2 49.7 2 34.3	50.10 50.60	49.85 50.05	..... .....	325 34 33.58 107 10 1.80	+ 0.31 + 0.66	- 4.37 + 3.62	-2 44.48 +2 44.45	+70 14 10.42
8	κ Capricorni	W E	3	21 34 54.0 21 40 13.0	2 35.2 2 43.8	50.15 50.70	49.80 50.05	..... .....	338 10 53.08 94 33 44.75	+ 0.32 + 0.76	+11.35 -12.65	-1 32.91 +1 32.91	-10 17 30.12
9	16 Pegasi	E W	2-5	21 46 6.5 21 51 25.5	2 45.2 2 33.8	50.90 50.40	50.40 49.95	..... .....	49 48 40.55 22 55 57.72	+ 1.01 + 0.51	-44.98 +38.98	+ 13.82 - 13.82	+25 29 23.34
10	o Aquarii	W E	3	21 55 44.0 22 1 23.0	2 47.9 2 51.1	50.15 51.10	49.65 50.70	..... .....	354 51 19.08 77 53 18.18	+ 0.26 + 1.29	+18.03 -18.72	- 51.18 + 51.20	- 2 36 16.04
11	λ Piscis Australis	E W	4	22 6 21.0 22 11 54.0	2 43.0 2 50.0	51.20 50.80	50.80 50.05	..... .....	103 29 16.75 329 15 16.28	+ 1.39 + 0.79	-10.78 +11.72	+2 16.34 -2 16.45	-28 13 48.84
12	3 Lacertæ	E W	3	22 17 1.0 22 22 32.5	2 55.8 2 35.7	51.35 50.70	50.70 50.10	..... .....	23 31 11.50 49 13 15.70	+ 1.41 + 0.77	+36.50 -28.63	- 13.23 + 13.23	+51 45 59.28
13	49 G. Piscis Australis	E W	4	22 30 48.0 22 36 16.0	2 49.8 2 38.2	51.40 50.65	50.65 49.95	..... .....	108 48 47.95 323 55 46.00	+ 1.40 + 0.68	-10.69 + 9.28	+3 1.04 -3 1.08	-33 34 5.57
14	7 Piscis Australis	W E	4	22 44 30.0 22 50 4.0	2 53.1 2 40.9	50.35 51.35	49.65 50.50	..... .....	324 7 29.22 108 37 1.80	+ 0.36 + 1.30	+11.14 - 9.63	-2 58.93 +2 58.91	-33 22 18.46
15	β Piscium	E W	3	22 56 21.0 23 1 41.0	2 49.6 2 30.4	51.35 50.90	50.40 50.05	..... .....	71 58 4.80 0 46 34.02	+ 1.24 + 0.83	-20.93 +16.46	+ 41.42 - 41.41	+ 3 19 8.52
16	5 H ¹ . Cassiopeiae	W E	2-5	23 6 8.5 23 11 28.5	2 42.8 2 37.2	50.65 50.90	49.95 50.30	..... .....	54 6 28.05 18 38 5.80	+ 0.65 + 0.95	-20.29 +18.92	+ 18.52 - 18.52	+56 39 26.73
17	ν Pegasi	E W	2-5	23 18 2.0 23 23 30.3	2 44.4 2 43.9	51.35 50.70	50.50 49.90	..... .....	52 24 20.12 20 20 14.10	+ 1.29 + 0.65	-38.25 +38.03	+ 16.66 - 16.67	+22 53 34.98
18	248 G. Aquarii	W E	3-5	23 28 8.0 23 33 25.0	2 38.3 2 38.7	50.40 51.35	49.60 50.60	..... .....	349 28 59.00 83 15 35.02	+ 0.36 + 1.38	+14.42 -14.50	-1 1.92 +1 1.96	- 7 58 49.61

Time.	Ther. 1982.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
6 22 37	49.2			6. Instrument in meridian; W. observation at VIII; E. observation at IX+5° with movable thread.	1	36 22 17.04	- 7.27
22 45	49.6				2	19.80	-18.83
22 51	49.7				3	18.20	.....
22 59	49.2				4	19.12	.....
23 12	47.9				5	18.04	-15.14
23 21	48.2				6	19.48	-26.32
23 28	47.5				7	17.78	.....
23 34	47.2				8	18.80	-11.15
23 42	46.8	48.4	29.918		9	16.90	.....
7 21 24	50.6	52.3	29.906		10	19.07	-17.17
21 29	50.7				11	18.02	- 8.39
21 35	50.9				12	18.62	.....
21 41	50.9				13	17.20	- 6.92
21 49	50.6				14	17.08	- 7.14
21 55	50.1				15	18.22	-18.81
22 7	49.9				16	17.04	.....
22 11	49.5				17	17.96	.....
22 20	49.3				18	18.11	-15.08
22 26		50.8	29.888				
22 31	49.8						
22 37	49.7						
22 45	49.9						
22 50	49.9	50.9	29.888				
22 53	50.2						
23 9	50.2						
23 21	49.4						
23 28	49.0						
23 33	48.7						

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	94 H ¹ . Aquarii	W	3	22 47 53.0	2 30.4	50.10	49.95	.....	351 58 40.95	+ 0.71	+13.66	- 56.25	- 5 29 2.48
		E	...	22 53 7.0	2 43.6	49.70	49.60	.....	80 45 57.28	+ 0.30	-16.16	+ 56.29	
2	c ¹ Aquarii	E	4	22 59 8.0	2 35.0	50.10	49.95	.....	99 30 44.40	+ 0.72	-10.41	+1 53.19	-24 14 52.92
		W	...	23 4 6.0	2 23.0	50.65	50.30	.....	333 13 51.48	+ 1.23	+ 8.87	-1 53.19	
3	φ ¹ Aquarii	W	2.5	23 8 18.0	2 45.2	50.50	50.15	.....	347 52 6.05	+ 1.00	+15.24	-1 5.01	- 9 35 44.98
		E	3	23 13 33.0	2 29.8	50.00	49.70	.....	84 52 27.92	+ 0.53	-12.53	+1 5.01	
4	κ Piscium	E	3	23 19 16.0	2 56.0	50.00	49.70	.....	74 32 25.50	+ 0.53	-21.27	+ 45.24	+ 0 44 45.38
		W	...	23 24 50.5	2 38.5	50.60	50.25	.....	358 12 13.95	+ 1.11	+17.25	- 45.24	
5	λ Andromedæ	W	2.5	23 33 .....	.....	50.50	50.15	26.883	43 22 57.38	+ 0.30	- 0.35	+ 7.11	+45 57 23.70
		E	...	.....	.....	49.75	49.45	26.883	29 18 57.88	- 0.73	+ 0.69	- 7.11	
6	α Aquarii November 12, L.	W	3.5	21 58 11.0	2 51.2	50.95	49.65	.....	356 41 11.25	+ 0.97	+19.47	- 48.51	- 0 46 18.79
		E	...	22 3 39.0	2 36.8	50.35	49.10	.....	76 3 21.82	+ 0.38	-16.33	+ 48.48	
7	θ Aquarii November 13, L.	W	3.5	22 9 4.0	2 53.3	50.85	49.00	.....	349 12 58.58	+ 0.44	+17.20	-1 3.71	- 8 14 49.77
		E	...	22 14 31.0	2 33.7	50.80	49.05	.....	83 31 35.10	+ 0.44	-13.53	+1 3.74	
8	38 Pegasi	E	...	22 26 .....	.....	50.65	49.05	26.684	43 10 18.65	+ 0.94	+ 0.13	+ 7.09	+32 5 55.41
		W	...	.....	.....	51.00	49.10	26.684	29 31 50.00	+ 1.15	- 0.13	- 7.09	
9	ε Piscis Australis.	W	4	22 32 36.0	2 56.5	50.65	48.70	.....	329 57 10.38	+ 0.10	+12.78	-2 15.03	-27 31 52.87
		E	...	22 38 12.0	2 39.5	51.05	49.25	.....	102 47 22.50	+ 0.67	-10.45	+2 15.03	
10	λ Aquarii	E	3.5	22 44 51.0	2 56.7	51.10	49.50	.....	83 21 20.92	+ 0.83	-17.94	+1 3.47	- 8 4 31.51
		W	...	22 50 27.0	2 39.3	51.20	49.25	.....	349 23 18.72	+ 0.75	+14.58	-1 3.49	
11	A Piscium	W	3.5	23 1 8.0	2 49.2	50.90	49.00	.....	359 4 43.62	+ 0.46	+20.04	- 45.18	+ 1 37 16.29
		E	...	23 6 38.0	2 40.8	50.95	48.95	.....	73 39 52.52	+ 0.46	-18.10	+ 45.19	
12	11 G. Sculptoris	E	4	23 13 30.0	2 50.2	50.95	49.00	.....	102 45 27.88	+ 0.49	-11.90	+2 15.06	-27 29 55.95
		W	...	23 19 4.0	2 43.8	51.25	49.15	.....	329 59 9.12	+ 0.73	+11.02	-2 15.04	
13	72 Pegasi	W	...	23 29 .....	.....	50.95	48.85	28.591	28 13 28.00	- 0.16	- 0.13	- 8.46	+30 48 48.58
		E	...	.....	.....	50.80	48.90	28.591	44 26 7.42	- 0.22	+ 0.13	+ 8.46	
14	λ Piscium	E	3.5	23 35 38.0	1 42.3	51.15	49.10	.....	74 0 53.38	+ 0.65	- 7.27	+ 45.76	+ 1 16 3.22
		W	...	23 39 4.0	1 43.7	51.30	49.10	.....	358 43 42.82	+ 0.73	+ 7.47	- 45.76	
15	274 G. Aquarii	W	3.5	23 45 52.0	2 42.5	50.85	48.85	.....	332 43 53.65	+ 0.37	+11.35	-1 59.28	-24 44 56.95
		E	...	23 51 16.0	2 41.5	50.85	48.90	.....	100 0 45.18	+ 0.38	-11.21	+1 59.33	
16	22 Andromedæ	E	3	0 6 .....	.....	50.85	48.80	26.137	29 43 27.65	+ 0.92	+ 0.22	- 6.91	+45 33 22.85
		W	...	.....	.....	51.10	49.10	26.137	42 59 25.98	+ 1.21	- 0.22	+ 6.91	
17	κ Cassiopeie	E	3	0 25 6.0	2 40.5	50.80	48.65	.....	12 52 37.62	+ 0.23	+12.70	- 25.81	+62 25 11.97
		W	...	0 30 25.0	2 38.5	50.90	48.75	.....	59 52 1.22	+ 0.34	-12.38	+ 25.81	
18	ν Cassiopeie	W	2.5	0 40 48.5	2 48.3	51.05	48.95	.....	47 55 10.85	+ 0.52	-38.22	+ 12.13	+50 27 43.67
		E	...	0 46 20.0	2 43.2	50.50	48.15	.....	24 49 28.00	- 0.17	+35.95	- 12.13	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1906.0.
d h m	°	°	in.				° ' "	"
10 22 59	49.3	.....	.....	5.	Instrument in meridian; W. observation at IX; E. observation at IX + 10° with movable thread.	1	16 22 18.10	-15.96
21 4	49.3	.....	.....	8.16.	Instrument in meridian, observation at II with movable thread.	2	18 14	- 9.80
21 11	49.2	.....	.....	13.	Instrument in meridian, observation at VIII with movable thread.	3	19.10	-14.50
21 22	49.1	.....	.....			4	18.54	.....
21 31	48.9	.....	.....			5	19.18	.....
21 40	50.9	29.676	.....			6	18.72	.....
12 21 08	19.0	40.3	29.510			7	19.11	.....
22 4	39.2	.....	.....			8	18.83	-27.05
11 22 29.5	34.5	35.6	29.566			9	18.04	.....
22 10	34.3	.....	.....			10	18.02	.....
22 24	34.0	.....	.....			11	19.50	-17.85
22 31	33.7	.....	.....			12	18.61	- 8.36
22 48	33.5	.....	.....			13	18.86	.....
21 4	33.1	34.3	29.570			14	18.59	-17.19
21 14	32.9	.....	.....			15	19.88	- 9.24
21 19.5	33.0	.....	.....			16	19.00	.....
21 25	33.0	.....	.....			17	19.86	-20.51
21 40	33.0	.....	.....			18	18.46	-33.51
21 46	33.0	.....	.....			
21 52	32.8	34.2	29.571					
21 4	32.9	.....	.....			
21 28	32.7	.....	.....			
21 28	32.7	.....	.....			
21 46	33.5	33.7	29.568					

Notes

5. Very faint and poor, clouds.

6. Faint, clouds

13. Poor, clouds

Notes
 5. Very faint and poor, clouds.
 6. Fair, clouds.
 13. Poor, clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	89 November 16, L. B. Ursæ Majoris s. p.	W	4	21 31 28.0	2 50.4	49.50	48.50	.....	107 44 36.48	+ 0.55	+ 4.52	+2 52.22	+69 39 29.29
		E	...	21 37 8.0	2 49.6	50.55	49.85	.....	325 0 1.08	+ 1.80	- 4.48	-2 52.34	
2	16 Cephei	W	...	21 55 41.0	2 18.8	49.90	48.95	.....	70 10 56.52	+ 1.00	- 4.36	+ 39.28	+72 44 29.05
		E	...	22 0 30.0	2 30.2	51.00	49.95	.....	2 33 40.18	+ 2.07	+ 5.10	- 39.32	
3	0 Aquarii	E	3	22 9 9.0	2 48.7	50.85	50.00	.....	83 31 37.38	+ 2.03	-16.30	+1 3.18	- 8 14 49.83
		W	...	22 14 26.0	2 28.3	49.85	48.80	.....	349 13 2.62	+ 0.90	+12.60	-1 3.18	
4	38 Pegasi	W	2.5	22 26 .....	.....	49.50	48.45	26.733	29 31 51.58	- 0.18	- 0.21	- 7.03	+32 5 55.81
		E	...	.....	.....	50.95	50.20	26.733	43 10 17.58	+ 1.42	+ 0.21	+ 7.03	
5	8 Piscis Australis	E	4	22 32 41.0	2 51.8	51.30	50.20	.....	102 47 25.20	+ 2.36	-12.12	+2 13.85	-27 31 52.72
		W	...	22 38 7.0	2 34.2	49.70	48.75	.....	329 57 13.72	+ 0.78	+ 9.76	-2 14.11	
6	λ Aquarii	W	4	22 45 3.0	2 45.1	49.40	48.40	.....	349 23 18.38	+ 0.46	+15.66	-1 3.10	- 8 4 31.29
		E	...	22 50 28.0	2 39.9	51.15	49.90	.....	83 21 17.20	+ 2.12	-14.69	+1 3.04	
7	A Piscium	E	3	23 1 7.0	2 50.6	51.05	49.85	.....	73 39 54.58	+ 2.02	-20.37	+ 44.82	+ 1 37 15.81
		W	...	23 6 33.0	2 35.4	49.80	48.50	.....	359 4 46.18	+ 0.70	+16.90	- 44.82	
8	11 G. Sculptoris	W	4	23 13 35.0	2 45.5	49.35	48.20	.....	329 59 10.70	+ 0.32	+11.25	-2 13.83	-27 29 56.14
		E	...	23 18 56.0	2 35.5	50.85	49.75	.....	102 45 28.62	+ 1.90	- 9.93	+2 13.83	
9	72 Pegasi	E	3	23 29 .....	.....	50.90	49.80	28.561	44 26 7.80	+ 2.65	+ 0.20	+ 8.38	+30 48 48.11
		W	...	.....	.....	49.85	48.55	28.561	28 13 28.62	+ 1.50	- 0.20	- 8.38	
10	λ Piscium	W	3.5	23 34 33.0	2 47.7	49.30	48.15	.....	358 43 33.20	+ 0.29	+19.53	- 45.37	+ 1 16 3.55
		E	...	23 40 16.0	2 55.3	51.00	49.70	.....	74 1 8.28	+ 1.94	-21.35	+ 45.38	
11	d Ursæ Majoris	W	3	9 22 46.0	3 31.0	50.65	48.90	.....	67 40 46.60	+ 0.66	-12.29	+ 36.26	+70 14 8.59
		E	...	9 27 50.0	1 33.0	50.35	48.65	.....	5 4 1.28	+ 0.36	+ 2.39	- 36.27	
12	89 B. Ursæ Majoris	E	3	9 31 38.0	2 40.5	50.10	48.60	.....	5 38 36.28	+ 0.21	+ 7.44	- 35.44	+69 39 27.15
		W	...	9 37 1.0	2 42.5	50.95	49.00	.....	67 6 0.42	+ 0.84	- 7.62	+ 35.44	
13	109 B. Ursæ Majoris	W	2.5	9 46 28.0	3 37.0	50.75	49.00	.....	70 45 37.95	+ 0.77	-10.15	+ 40.80	+73 19 6.27
		E	...	9 51 49.0	1 44.0	50.20	48.60	.....	1 59 8.72	+ 0.28	+ 2.33	- 40.80	
14	16 Cephei s. p.	E	4	9 55 48.0	2 11.7	50.15	48.50	.....	328 4 37.78	+ 0.19	- 2.35	-2 28.92	+72 44 30.25
		W	...	10 0 48.0	2 48.3	50.80	49.00	.....	104 39 58.95	+ 0.76	+ 3.84	+2 28.95	
15	24 Cephei s. p.	W	4	10 5 36.0	2 29.5	50.70	48.95	.....	105 31 8.10	+ 0.71	+ 3.16	+2 35.58	+71 53 14.61
		E	...	10 10 36.0	2 30.5	50.15	48.60	.....	327 13 29.10	+ 0.26	- 3.20	-2 35.68	
16	30 H. Ursæ Majoris	E	2.5	10 14 25.0	3 1.7	50.05	48.40	.....	9 15 51.68	+ 0.12	+12.48	- 30.57	+66 2 2.07
		W	...	10 19 50.0	2 23.3	50.70	48.95	.....	63 28 40.65	+ 0.70	- 7.76	+ 30.56	
17	9 H. Draconis	W	2.5	10 24 20.0	2 51.5	50.70	48.90	.....	73 37 41.40	+ 0.70	- 4.92	+ 45.43	+76 11 20.27
		E	...	10 29 34.0	2 22.5	50.35	48.60	.....	359 6 57.45	+ 0.35	+ 3.40	- 45.43	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° / "</i>	<i>"</i>
16 21 32	41.9	44.0	29.758	4. Instrument in meridian, observation at IX with movable thread.	1	36 22 19.92	+29.42
21 37.5	41.6	.....	.....	9. Instrument in meridian, observation at I with movable thread.	2	20.24	-33.11
21 52.5	42.2	.....	.....		3	19.62	.....
21 58	40.9	.....	.....		4	20.86	-27.11
22 4	41.3	.....	.....		5	19.72	.....
22 10	41.8	.....	.....		6	19.54	.....
22 15	41.7	.....	.....		7	20.00	-17.71
22 27	40.6	42.3	29.769		8	21.43	- 8.01
22 33	41.0	.....	.....		9	20.60	.....
22 40	39.7	.....	.....		10	20.95	-17.04
22 46	39.5	.....	.....		11	19.50	.....
22 51	40.1	.....	.....		12	18.78	+29.49
23 1.5	40.3	.....	.....		13	19.95	.....
23 7	40.2	.....	.....		14	19.60	-33.11
23 14	40.6	.....	.....		15	19.02	.....
23 19	40.6	.....	.....		16	18.93	.....
23 30	40.6	.....	.....		17	19.19	.....
23 39	40.6	42.0	29.790				
9 23	33.9	34.4	29.759				
9 35	33.7	.....	.....		
9 46	33.8	.....	.....		
9 56	33.5	.....	.....		
10 1	33.4	.....	.....	2 W. One microscope reading decreased 10".			
10 6	33.3	.....	.....	2 E. One level reading increased 1 div.			
10 11	33.0	.....	.....	3 W., 11 W. One microscope reading increased 10".			
10 15	33.0	.....	.....		
10 20	33.2	.....	.....		
10 25	33.0	.....	.....		
10 30	33.0	34.3	29.759				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	November 21, L. 89 B. Ursæ Majoris S. P.	E W	4 ...	21 31 32.0 21 36 58.0	2 46.9 2 39.1	48.30 48.30	49.65 49.45	..... .....	324 59 49.88 107 44 44.75	+ 1.11 + 0.97	- 4.34 + 3.94	- 2 43.23 + 2 43.28	+ 69 39 28.39
2	109 B. Ursæ Majoris S. P.	W E	4 ...	21 46 44.0 21 51 10.0	3 21.6 1 4.4	48.45 49.10	49.45 50.25	..... .....	104 5 33.88 328 38 56.58	+ 1.08 + 1.80	+ 5.35 - 0.54	+ 2 14.89 - 2 14.95	+ 73 19 6.99
3	16 Cephei	E W	3 ...	21 55 18.0 22 0 40.0	2 41.5 2 40.5	48.95 48.60	50.30 49.35	..... .....	2 33 36.90 70 10 59.78	+ 1.77 + 1.10	+ 5.90 - 5.83	- 37.27 + 37.29	+ 72 44 29.37
4	24 Cephei	W E	3.5 ...	22 5 27.0 22 10 28.0	2 38.3 2 22.7	48.60 49.40	49.35 50.40	..... .....	69 19 44.30 3 24 51.78	+ 1.13 + 2.03	- 6.07 + 4.94	+ 36.10 - 36.11	+ 71 53 13.26
5	30 H. Ursæ Majoris S. P.	E W	4.5 ...	22 14 30.0 22 19 34.0	2 57.1 2 6.9	49.00 48.65	49.60 49.45	..... .....	321 23 6.90 111 21 31.70	+ 1.42 + 1.19	- 5.60 + 2.87	- 3 24.56 + 3 24.32	+ 65 2 2.19
6	9 H. Draconis S. P.	W E	4 ...	22 24 14.0 22 29 30.0	2 58.1 2 17.9	48.60 49.10	49.25 49.80	..... .....	101 13 39.28 331 30 54.65	+ 1.06 + 1.57	+ 3.55 - 2.13	+ 1 58.01 - 1 58.05	+ 76 11 20.22
7	35 H. Ursæ Majoris S. P.	E W	4 ...	22 33 36.0 22 38 50.0	2 49.5 2 24.5	48.75 48.50	49.55 49.50	..... .....	324 53 58.20 107 50 36.98	+ 1.30 + 1.10	- 4.40 + 3.26	- 2 44.50 + 2 44.55	+ 69 33 35.46
8	δ Aquarii	W E	3.5 ...	22 47 1.0 22 52 25.0	2 44.2 2 39.8	48.35 49.35	49.00 50.15	..... .....	341 9 6.20 91 35 30.02	+ 0.78 + 1.90	+ 13.37 - 12.66	- 1 20.00 + 1 20.00	- 16 19 2.61
9	5 Andromedæ	E W	2.5 ...	23 4 ..... .....	..... .....	49.35 48.45	50.15 49.10	26.577 26.577	26 29 3.08 46 13 13.88	+ 2.46 + 1.47	+ 0.25 - 0.25	- 9.69 + 9.69	+ 48 47 31.19
10	κ Piscium	W E	3 ...	23 19 21.0 23 24 43.0	2 51.5 2 30.5	47.80 49.80	48.75 50.95	..... .....	358 12 10.90 74 32 21.28	+ 0.34 + 2.49	+ 20.18 - 15.55	- 43.79 + 43.80	+ 0 44 41.65
11	λ Andromedæ	W E	3 ...	23 33 ..... .....	..... .....	48.10 49.95	49.10 51.05	26.997 26.997	43 22 54.80 29 18 49.82	+ 0.11 + 2.06	- 0.22 + 0.22	+ 6.89 - 6.89	+ 45 57 25.03
12	19 Piscium	E W	3.5 ...	23 39 3.0 23 44 28.0	2 38.0 2 47.0	49.70 48.35	50.55 49.25	..... .....	72 18 57.65 0 25 33.85	+ 2.26 + 0.94	- 18.02 + 20.14	+ 40.48 - 40.48	+ 2 58 12.89
13	27 Piscium	W E	3.5 ...	23 51 9.0 23 56 31.0	2 48.4 2 33.6	48.00 49.90	49.05 50.60	..... .....	353 23 13.45 79 21 19.68	+ 0.63 + 2.41	+ 17.60 - 14.65	- 52.04 + 52.05	- 4 4 23.07
14	22 Andromedæ	W E	3.5 ...	0 6 ..... .....	..... .....	48.25 50.00	49.20 50.85	26.234 26.234	42 59 25.78 29 43 21.10	+ 0.26 + 2.00	- 0.22 + 0.22	+ 6.50 - 6.50	+ 45 33 24.60
15	ρ Andromedæ	E W	3.5 ...	0 16 ..... .....	..... .....	49.70 48.35	50.55 49.30	26.804 26.804	37 48 54.88 34 53 3.00	+ 2.83 + 1.52	+ 0.17 - 0.17	+ 1.43 - 1.43	+ 37 27 18.65
16	77 G. Sculptoris	W E	4 ...	0 26 30.0 0 31 30.0	2 38.0 2 22.0	48.20 50.15	49.00 51.00	..... .....	327 24 47.75 105 19 44.50	+ 0.69 + 2.76	+ 9.82 - 7.93	- 2 24.07 + 2 24.09	- 30 4 27.77
17	ν Cassiopeæ	E W	3 ...	0 40 38.0 0 46 18.5	2 59.3 2 41.2	49.70 48.45	50.60 49.30	..... .....	24 49 15.35 47 55 10.70	+ 2.30 + 0.99	+ 43.37 - 35.06	- 11.43 + 11.42	+ 50 27 46.08
18	November 22, L. 109 B. Ursæ Majoris S. P.	E W	3.5 ...	21 47 10.0 21 53 6.0	2 55.7 3 0.3	49.20 49.80	50.00 50.50	..... .....	328 39 3.45 104 5 30.40	+ 0.49 + 1.06	- 4.06 + 4.28	- 2 19.58 + 2 19.61	+ 73 19 5.63

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
21 21 32	66.6	67.7	29.676	9.15. Instrument in meridian, observation at II with movable thread.	1	36 22 18.18	+ 30.02
21 21 40	66.3	.....	.....	11.14. Instrument in meridian, observation at VIII with movable thread.	2	19.04	.....
21 21 47	65.9	.....	.....		3	19.82	- 31.42
21 21 52	65.7	.....	.....		4	19.05	.....
21 21 56	65.7	.....	.....		5	19.12	.....
21 22 1	65.3	.....	.....		6	18.97	.....
21 22 8	65.3	.....	.....		7	18.20	+ 10.16
21 22 15	64.9	.....	.....		8	19.80	.....
21 22 20	66.6	.....	.....		9	19.74	30.18
21 22 25	65.5	.....	.....		10	19.82	.....
21 22 30	66.3	.....	.....		11	19.84	.....
21 22 34	66.1	.....	.....		12	18.41	- 17.38
21 22 39	66.1	66.9	29.664		13	19.66	.....
21 22 40	65.3	.....	.....		14	19.87	.....
21 22 43	65.1	.....	.....		15	19.68	24.95
21 22 44	64.6	.....	.....		16	18.80	- 6.57
21 22 47	63.9	.....	.....		17	18.82	- 25.07
21 22 48	61.6	.....	.....		18	17.82	.....
21 22 54	63.5	.....	.....		
21 23 0	61.1	.....	.....		
21 23 05	61.0	.....	.....		
21 23 07	61.6	64.7	29.641				
21 23 09	61.1	.....	.....		
21 23 10	61.1	.....	.....		
21 23 14	61.1	.....	.....		
21 23 17	61.3	66.1	29.922				
21 23 18	61.2	.....	.....		

No.	Date, observer, and object.	Circle.	See-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	24 Cephei	E W	3 ...	22 5 1.0 22 10 2.0	3 4.3 1 56.7	49.20 49.55	49.65 50.05	..... .....	3 24 51.08 69 19 40.65	+ 0.30 + 0.71	+ 8.23 - 3.30	- 37.35 + 37.37	+71 53 13.43
2	30 H. Ursæ Majoris s.p.	W E	4 ...	22 14 32.0 22 19 32.0	2 55.3 2 4.7	49.50 49.05	50.00 49.60	..... .....	111 21 17.85 321 23 12.72	+ 0.65 + 0.21	+ 5.48 - 2.77	+3 31.80 -3 32.00	+66 2 4.34
3	7 Lacertæ	E W	3 ...	22 24 34.5 22 30 8.0	2 56.1 2 37.4	49.05 49.80	49.45 50.00	..... .....	25 28 34.72 47 15 53.28	+ 0.12 + 0.76	+44.95 -35.91	- 11.12 + 11.12	+49 48 27.14
4	13 Lacertæ	W E	3 ...	22 40 ..... .....	..... .....	49.65 49.25	49.95 49.45	28.003 28.003	38 44 53.85 33 55 29.50	+ 0.11 - 0.34	- 0.19 + 0.19	+ 2.43 - 2.43	+41 20 1.49
5	δ Aquarii	E W	3.5 ...	22 46 56.0 22 52 20.0	2 49.3 2 34.7	49.55 49.60	50.05 50.05	..... .....	91 35 27.90 341 9 10.12	+ 0.70 + 0.72	-14.20 +11.87	+1 23.00 -1 23.04	-16 19 2.01
6	5 Andromedæ	W E	3 ...	23 4 ..... .....	..... .....	49.20 50.20	49.40 50.35	26.607 26.607	46 13 13.65 26 29 3.82	- 0.39 + 0.61	- 0.25 + 0.25	+ 10.07 - 10.07	+48 47 31.09
7	τ Pegasi	E W	3 ...	23 13 17.0 23 18 47.0	2 47.8 2 42.2	50.50 49.70	50.45 49.70	..... .....	52 4 1.75 20 40 35.55	+ 1.36 + 0.58	-40.59 +37.92	+ 16.28 - 16.28	+23 13 56.33
8	δ ³ Aquarii	W E	3.5 ...	23 25 44.0 23 30 55.0	2 43.2 2 27.8	49.15 50.40	49.35 50.35	..... .....	336 2 40.80 96 41 54.32	+ 0.12 + 1.26	+12.11 - 9.93	-1 41.31 +1 41.35	-21 25 50.79
9	λ Piscium	E W	3 ...	23 35 14.0 23 39 46.0	2 6.8 2 25.2	50.50 49.45	50.40 49.45	..... .....	74 0 58.40 358 43 35.25	+ 1.37 + 0.39	-11.17 +14.65	+ 44.67 - 44.67	+ 1 16 3.01
10	89 B. Ursæ Majoris	W E	3 ...	9 31 27.0 9 37 1.0	2 52.1 2 41.9	51.00 49.35	49.40 48.00	..... .....	67 5 58.95 5 38 37.22	+ 2.53 + 1.00	- 8.55 + 7.56	+ 35.58 - 35.62	+69 39 26.03
11	109 B. Ursæ Majoris	E W	3 ...	9 46 24.0 9 51 30.0	3 41.8 1 24.2	48.85 51.20	47.45 49.90	..... .....	1 59 2.75 70 45 27.60	+ 0.46 + 2.93	+10.60 - 1.53	- 41.06 + 41.07	+73 19 5.51
12	24 Cephei s. P.	E W	4 ...	10 5 5.0 10 10 12.0	3 0.3 2 6.7	49.35 51.55	47.80 49.85	..... .....	327 13 34.08 105 31 6.05	+ 0.92 + 3.08	- 4.59 + 2.26	-2 36.63 +2 36.60	+71 53 16.05
13	30 H. Ursæ Majoris	W E	3 ...	10 14 39.0 10 19 11.0	2 48.3 1 43.7	51.50 49.40	49.80 47.75	..... .....	63 28 40.68 9 16 0.82	+ 3.02 + 0.87	-10.72 + 4.07	+ 30.74 - 30.73	+66 2 1.19
14	9 H. Draconis	E W	3 ...	10 24 48.0 10 29 36.0	2 24.3 2 23.7	49.05 51.45	47.60 49.85	..... .....	359 6 59.55 73 37 36.68	+ 0.64 + 3.05	+ 3.48 - 3.45	- 45.69 + 45.72	+76 11 18.86
15	35 H. Ursæ Majoris	W E	3 ...	10 33 35.0 10 38 48.0	2 50.7 2 22.3	51.70 49.30	50.25 47.50	..... .....	67 0 7.68 5 44 31.88	+ 3.32 + 0.70	- 8.47 + 5.89	+ 35.61 - 35.62	+69 33 34.49
16	ε Cephei s. P.	E W	4 ...	10 43 46.0 10 49 32.0	2 40.0 3 6.0	49.10 51.90	47.50 50.25	..... .....	321 4 22.90 111 40 10.50	+ 0.60 + 3.43	- 4.62 + 6.24	-3 45.83 +3 45.88	+65 42 56.65
17	November 23, L. 9 H. Draconis s. P.	E W	2.5 ...	22 24 58.0 22 29 34.0	2 14.5 2 21.5	50.50 50.40	49.25 49.25	..... .....	331 31 9.52 101 13 39.22	+ 0.57 + 0.53	- 2.02 + 2.24	-2 5.57 +2 5.62	+76 11 20.59
18	ε Cephei	W E	2.5 ...	22 43 30.0 22 49 6.0	2 56.0 2 40.0	50.55 50.55	49.40 49.40	..... .....	63 9 43.12 9 35 7.62	+ 0.69 + 0.67	-11.99 + 9.91	+ 29.92 - 29.93	+65 42 53.59
19	55 Pegasi	E W	3 ...	22 59 22.0 23 4 53.0	2 59.8 2 31.2	50.50 50.65	49.45 49.50	..... .....	66 23 8.20 6 21 48.48	+ 0.67 + 0.79	-27.09 +19.16	+ 34.26 - 34.27	+ 8 54 25.91

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1006.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
22 22 8	52.7	.....	.....	4, 6. Instrument in meridian, observation at VIII with movable thread.	1	36 22 18.84	.....
22 22 16	52.2	.....	.....		2	16.07	.....
22 22 20	51.9	.....	.....		3	18.96	.....
22 22 28	51.7	.....	.....		4	19.09	-29.27
22 22 38	51.9	.....	.....		5	18.54	.....
22 22 47	51.7	53.6	29.942		6	19.36	-30.23
22 22 53	51.5	.....	.....		7	18.28	.....
23 23 2	51.0	.....	.....		8	19.36	-16.87
23 23 17	50.6	.....	.....		9	19.42	+30.10
23 23 26	50.8	.....	.....		10	19.34	.....
23 23 31	50.6	.....	.....		11	21.41	.....
23 23 39	50.6	51.9	29.950		12	20.88	.....
23 23 49	50.6	38.7	30.082		13	19.18	.....
23 23 55	35.8	.....	.....		14	19.99	.....
23 24 5	35.2	.....	.....		15	20.50	+30.38
23 24 10.5	35.4	.....	.....		16	19.65	.....
23 24 18	35.7	.....	.....		17	25.06	.....
23 24 28	35.4	.....	.....		18	25.00	.....
23 24 37	34.7	.....	.....		19	25.10	-19.89
23 24 44	34.9	.....	.....		
23 24 50	34.8	36.9	30.100				
23 24 55	42.5	.....	.....		
23 25 30	42.3	43.7	30.106				
23 25 47	42.1	.....	.....		
23 25 52	41.6	.....	.....		

Note.
2 W. One microscope reading decreased 30".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	☿ Pegasi	W	2.5	23 13 30.5	2 34.4	50.45	49.15	.....	20 40 47.78	+ 0.48	+34.37	- 16.68	+23 13 57.19
		E	...	23 18 42.5	2 37.6	51.05	49.60	.....	52 4 3.38	+ 1.00	-35.80	+ 16.68	
2	♂ Aquarii	E	3.5	23 25 38.0	2 49.3	51.25	49.90	.....	96 42 2.22	+ 1.26	-13.02	+1 43.86	-21 25 52.10
		W	...	23 31 4.0	2 36.7	51.05	49.60	.....	336 2 48.10	+ 1.02	+11.16	-1 43.86	
3	♂ Aquarii	W	4	23 36 51.0	2 34.5	50.50	49.00	.....	338 40 46.32	+ 0.43	+11.34	-1 33.68	-18 47 44.47
		E	...	23 41 55.0	2 29.5	51.20	49.80	.....	94 4 2.78	+ 1.18	-10.62	+1 33.70	
4	274 G. Aquarii	E	4	23 46 14.0	2 21.1	51.45	50.00	.....	100 0 48.90	+ 1.43	- 8.56	+1 59.39	-24 44 58.60
		W	...	23 51 8.0	2 32.9	50.85	49.35	.....	332 43 58.78	+ 0.83	+10.05	-1 59.40	
5	5 Ceti	W	3	0 0 29.0	3 0.3	50.30	49.00	.....	354 29 40.22	+ 0.35	+20.63	- 53.25	- 2 58 0.23
	November 26, L.	E	...	0 6 9.0	2 39.7	51.30	50.00	.....	78 15 3.68	+ 1.36	-16.18	+ 53.25	
6	7 Lacertæ	W	3	22 24 52.5	2 38.2	50.20	50.05	.....	47 15 57.82	+ 1.33	-36.27	+ 11.01	+49 48 27.09
		E	...	22 30 5.0	2 34.3	50.20	50.00	.....	25 28 48.65	+ 1.26	+34.51	- 11.01	
7	13 Lacertæ	E	2.5	22 40 ....	.....	50.05	49.75	28.013	33 55 32.85	+ 1.65	+ 0.19	- 2.41	+41 20 1.83
		W	...	.....	.....	50.05	49.75	28.013	38 44 58.40	+ 1.63	- 0.19	+ 2.41	
8	55 Pegasi	W	3	22 59 23.0	2 58.9	49.30	49.05	.....	6 21 38.78	+ 0.34	+26.83	- 33.07	+ 8 54 25.55
		E	...	23 4 55.0	2 33.1	50.15	50.05	.....	66 23 0.78	+ 1.26	-19.05	+ 33.08	
9	27 Piscium	E	3	23 51 9.0	2 48.7	50.45	50.30	.....	79 21 27.50	+ 1.56	-17.67	+ 53.43	- 4 4 23.89
	November 28, L.	W	...	23 56 19.0	2 21.3	49.95	49.65	.....	353 23 23.38	+ 0.97	+12.40	- 53.42	
10	77 G. Sculptoris	E	4	0 26 19.0	2 49.2	50.90	49.60	.....	105 19 45.70	+ 0.54	-11.26	+2 33.00	-30 4 28.53
		W	...	0 31 46.0	2 37.8	50.95	49.55	.....	327 24 59.95	+ 0.52	+ 9.80	+2 33.04	
11	73 G. Ceti	W	4	0 37 18.0	2 53.6	50.90	49.45	.....	334 57 26.90	+ 0.46	+13.45	-1 48.52	-22 31 13.54
		E	...	0 43 4.0	2 52.4	50.85	49.40	.....	97 47 17.38	+ 0.41	-13.26	+1 48.54	
12	α Sculptoris	E	4	0 51 22.0	2 48.8	50.95	49.35	.....	105 7 6.65	+ 0.42	-11.25	+2 31.51	-29 51 48.17
		W	...	0 56 45.0	2 34.2	51.25	50.05	.....	327 37 38.45	+ 0.96	+ 9.39	-2 31.52	
13	γ Piscium	W	3	1 3 30.0	3 0.6	51.00	49.45	.....	17 59 9.48	+ 0.50	+41.09	- 19.73	+20 32 24.35
		E	...	1 9 10.5	2 39.9	50.95	49.35	.....	54 45 28.38	+ 0.43	-32.21	+ 19.73	
14	ω Andromedæ	E	2.5	1 22 ....	.....	50.95	49.35	26.517	30 20 59.92	+ 1.00	+ 0.22	- 6.25	+44 55 39.73
		W	...	.....	.....	51.30	50.00	26.517	42 21 33.08	+ 1.54	- 0.22	+ 6.25	
15	π Piscium	W	3	1 29 22.0	2 51.6	51.10	49.90	.....	9 7 4.15	+ 0.78	+26.72	- 30.58	+11 30 54.41
		E	...	1 34 42.0	2 28.4	50.90	49.35	.....	63 37 34.92	+ 0.42	-19.98	+ 30.58	
16	γ Ceti	E	3	1 42 6.0	2 58.6	50.75	49.30	.....	86 25 42.18	+ 0.32	-17.32	+1 10.84	-11 8 55.19
	November 29, L.	W	...	1 47 39.0	2 34.4	51.05	50.10	.....	346 19 8.68	+ 1.17	+12.94	-1 10.86	
17	32 Ursæ Majoris S.P.	E	3.5	22 8 42.0	2 37.1	50.15	49.05	.....	320 55 41.55	+ 1.20	- 4.47	-3 46.16	+65 34 10.28
		W	...	22 13 46.0	2 26.9	51.60	50.75	.....	111 49 4.72	+ 2.79	+ 3.91	+3 46.44	
18	32 H. Cephei	W	2.5	22 18 34.0	2 23.4	51.85	50.85	.....	83 4 43.12	+ 2.96	- 0.91	+1 3.34	+85 38 40.42
		E	...	22 23 44.0	2 46.6	50.20	48.95	.....	349 40 2.32	+ 1.18	+ 1.23	-1 3.36	

Time.	Ther. 3892	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1906 0.
<i>h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
21 23 16	41.6	...	...	7.14. Instrument in meridian, observation at II with movable thread.							1	36 22 25.60	...
21 23 26	41.5	42.7	30.110								2	25.37	- 9.34
21 23 35	41.5	...	...								3	25.72	...
21 23 47	41.3	...	...								4	25.71	- 8.11
21 23 42	41.2	...	...								5	25.03	-14.87
21 23 55	41.0	...	...								6	23.65	...
21 24 55	41.0	...	...								7	25.20	-29.17
21 25 5	40.9	41.7	30.106								8	24.18	-19.65
21 25 25	40.9	...	...								9	24.08	...
21 25 31	55.7	56.3	29.882								10	22.60	- 5.15
21 25 38	55.3	...	...								11	22.68	- 7.44
21 25 5	55.1	56.0	29.876								12	22.10	...
21 25 15	54.0	...	...								13	21.84	-18.59
21 25 55	54.1	55.0	29.862								14	24.62	-22.15
21 26 55	53.6	...	...								15	21.50	...
21 27 5	53.5	49.7	29.954								16	23.98	...
21 27 55	53.1	...	...								17	24.92	...
21 28 45	52.2	...	...								18	24.94	-13.79
21 29 5	52.2	...	...								
21 29 12	52.2	...	...								
21 29 20	52.2	...	...								
21 29 32	52.1	...	...								
21 29 45	52.0	39.9	29.999										
21 29 59	52.0	...	...								

Notes
 4 Very faint.
 7 E. One microscope reading increased 10".
 9 Clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	35 H. Ursæ Majoris S. P.	W E	4 ...	22 33 36.0 22 39 6.0	2 50.4 2 39.6	51.55 49.60	50.60 48.55	..... .....	107 50 29.12 324 54 17.65	+ 2.67 + 0.63	+ 4.54 - 3.98	+2 56.62 -2 56.60	+69 33 35.53
2	ε Cephei	E W	3 ...	22 43 38.0 22 49 28.0	2 48.0 3 2.0	49.25 51.70	48.25 50.80	..... .....	9 35 7.40 63 9 41.85	+ 0.31 + 2.88	+10.93 -12.82	- 30.19 + 30.19	+65 42 53.67
3	π Cephei	W E	2.5 ...	23 2 3.0 23 7 52.0	2 58.3 2 50.7	51.80 49.65	50.70 48.45	..... .....	72 19 46.25 0 25 1.25	+ 2.89 + 0.62	- 5.99 + 5.49	+ 43.39 - 43.41	+74 53 18.15
4	ο Cephei	E W	2.5 ...	23 11 56.0 23 17 15.0	2 56.5 2 22.5	49.25 51.80	48.10 50.65	..... .....	7 41 41.48 65 3 1.88	+ 0.24 + 2.85	+10.49 - 6.84	- 32.74 + 32.75	+67 36 22.43
5	λ Draconis S. P.	W E	4.5 4	23 23 4.0 23 28 22.0	2 50.1 2 27.9	51.75 49.55	50.65 48.35	..... .....	107 33 36.32 325 11 9.70	+ 2.84 + 0.51	+ 4.47 - 3.38	+2 54.27 -2 54.35	+69 50 30.44
6	16 Cephei S. P.	W E	4 ...	9 55 22.0 10 1 56.0	2 37.3 3 56.7	51.35 50.10	49.55 48.15	..... .....	104 40 1.82 328 4 50.80	+ 2.43 + 1.10	+ 3.35 - 7.59	+2 31.13 -2 31.06	+72 44 30.41
7	32 Ursæ Majoris	E W	2.5 ...	10 8 46.0 10 13 41.0	2 33.2 2 21.8	50.00 51.50	48.00 49.75	..... .....	9 43 54.50 63 0 53.18	+ 0.99 + 2.63	+ 9.18 - 7.87	- 30.35 + 30.35	+65 34 8.83
8	32 H. Cephei S. P.	W E	4 3	10 18 0.0 10 24 4.0	2 57.2 3 6.8	51.55 50.00	49.75 48.05	..... .....	91 46 55.32 340 57 51.50	+ 2.66 + 1.02	+ 1.23 - 1.36	+1 27.58 -1 27.58	+85 38 41.55
9	35 H. Ursæ Majoris	E W	3 ...	10 33 42.0 10 39 10.0	2 44.5 2 43.5	49.45 51.50	47.55 49.70	..... .....	5 44 36.40 67 0 12.18	+ 0.45 + 2.58	+ 7.87 - 7.77	- 35.80 + 35.81	+69 33 33.79
10	ε Cephei S. P.	W E	4 ...	10 43 38.0 10 49 4.0	2 47.9 2 38.1	51.65 49.55	49.80 47.90	..... .....	111 40 19.12 321 4 29.35	+ 2.73 + 0.67	+ 5.08 - 4.51	+3 47.02 -3 47.18	+65 42 55.34
11	λ Draconis	W E	3 ...	11 23 5.0 11 28 20.0	2 49.2 2 25.8	51.80 50.00	49.90 48.05	..... .....	67 17 6.45 5 27 42.10	+ 2.86 + 1.02	- 8.15 + 6.05	+ 36.33 - 36.29	+69 50 29.15
12	December 1, L. δ ¹ Aquarii	E W	3 ...	23 37 8.0 23 42 11.0	2 17.7 2 45.3	51.35 49.80	50.60 49.20	..... .....	94 4 1.20 338 40 41.32	+ 2.38 + 0.89	- 9.01 +12.98	+1 32.30 -1 32.34	-18 47 45.16
13	December 2, L. 32 Ursæ Majoris S. P.	W E	4 ...	22 8 24.0 22 14 16.0	2 55.5 2 56.5	50.25 50.15	48.95 48.70	..... .....	111 49 4.20 320 55 44.45	+ 1.40 + 1.24	+ 5.58 - 5.65	+3 45.29 -3 45.44	+65 34 12.21
14	32 H. Cephei	E W	2.5 ...	22 18 36.0 22 23 48.0	2 20.7 2 51.3	49.95 50.15	48.60 48.65	..... .....	349 40 2.62 83 4 45.85	+ 1.09 + 1.20	+ 0.88 - 1.30	-1 3.08 +1 3.11	+85 38 40.53
15	36 H. Cephei	W E	2.5 ...	22 52 30.0 22 57 32.0	2 48.0 2 14.0	50.40 50.35	48.75 48.65	..... .....	81 17 18.15 351 27 29.85	+ 1.39 + 1.31	- 1.82 + 1.16	+ 59.29 - 59.31	+83 51 8.85
16	π Cephei	E W	2.5 ...	23 2 22.0 23 7 23.0	2 39.3 2 21.7	50.10 49.95	48.45 48.45	..... .....	0 25 1.80 72 19 46.52	+ 1.08 + 1.02	+ 4.78 - 3.78	- 43.18 + 43.20	+74 53 18.09
17	ο Cephei	W E	2.5 ...	23 11 57.0 23 17 35.0	2 55.6 2 42.4	50.20 50.15	48.65 48.55	..... .....	65 3 7.58 7 41 41.92	+ 1.22 + 1.17	-10.39 + 8.88	+ 32.58 - 32.59	+67 36 22.65
18	λ Draconis S. P.	E W	3 ...	23 23 12.0 23 28 38.0	2 42.5 2 43.5	50.00 50.05	48.50 48.55	..... .....	325 11 8.48 107 33 40.58	+ 1.05 + 1.12	- 4.08 + 4.13	-2 53.28 +2 53.20	+69 50 29.72

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
29 22 14	39.3	41.4	30.160								1	36 22 25.32	+31.21
22 22	39.2	.....	.....								2	25.28	.....
22 34	39.0	.....	.....								3	25.24	.....
22 39.5	39.1	.....	.....								4	25.06	.....
22 46	38.8	.....	.....								5	25.19	.....
23 5	38.5	.....	.....								6	25.99	-33.39
23 15	38.2	.....	.....								7	26.30	.....
23 23.5	37.9	39.4	30.166								8	25.18	-33.83
9 55.5	32.7	33.3	30.148								9	25.86	+31.29
10 2	32.9	.....	.....								10	26.14	.....
10 12	33.3	.....	.....								11	25.18	.....
10 21	33.0	.....	.....								12	24.86	.....
10 34	33.3	34.3	30.152								13	25.54	.....
10 44	33.4	.....	.....								14	25.18	-33.99
10 49.5	33.0	.....	.....								15	25.01	-33.95
11 2.5	33.0	.....	.....								16	25.72	.....
11 23.5	31.7	33.9	30.163								17	25.18	.....
11 28.5	32.4	.....	.....								18	25.60	.....
1 23 37.5	43.5	45.3	29.806										
23 42.5	43.3	.....	.....								
23 54.5	43.1	.....	.....								
2 22 9	37.0	.....	.....								
22 14.5	36.7	38.7	29.860										
22 22.5	36.3	.....	.....								
22 56	36.0	.....	.....								
23 5	35.7	.....	.....								
23 15	35.3	37.1	29.838										

Notes.
10. Very faint; clouds.
12. Poor observation; clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β^1 Aquarii	E W	3.5 ...	23 36 33.0 23 42 13.0	2 52.8 2 47.2	50.55 49.90	49.05 48.15	..... .....	94 4 6.50 338 40 43.90	+ 1.59 + 0.82	-14.19 +13.28	+1 34.06 -1 34.06	-18 47 45.16
2	ω Piscium	W E	3 ...	23 52 4.0 23 57 1.0	2 31.4 2 25.6	49.10 50.35	47.80 49.05	..... .....	3 48 20.78 68 56 25.90	+ 0.21 + 1.49	+17.96 -16.61	- 38.05 + 38.05	+ 6 20 52.89
3	β Cassiopeiae	E W	3 ...	0 1 41.0 0 6 53.0	2 35.9 2 36.1	50.25 49.80	48.90 48.05	..... .....	16 39 23.35 56 5 25.50	+ 1.39 + 0.72	+15.91 -15.95	- 21.36 + 21.36	+58 38 23.02
4	ρ Andromedæ	W E	3 ...	0 16 .... .....	..... .....	49.50 50.50	48.05 49.05	27.927	34 53 7.00 37 50 21.58	- 0.02 + 0.99	- 0.17 + 0.17	- 1.52 + 1.52	+37 27 19.16
5	December 3, L. 32 Ursæ Majoris	W E	3 ...	10 8 45.0 10 13 44.0	2 34.6 2 24.4	50.20 49.25	49.55 48.85	..... .....	63 0 54.10 9 43 50.45	+ 1.67 + 0.85	- 9.35 + 8.16	+ 31.02 - 31.02	+65 34 8.35
6	32 H. Cephei s. p.	E W	3 ...	10 19 6.0 10 23 30.0	1 50.2 2 33.8	49.05 50.05	48.70 49.55	..... .....	340 57 53.02 91 46 55.45	+ 0.67 + 1.60	- 0.48 + 0.93	-1 29.50 +1 29.52	+85 38 41.25
7	36 H. Cephei s. p.	W E	3 ...	10 52 30.0 10 57 24.0	2 47.7 2 6.3	49.90 49.05	49.20 48.65	..... .....	93 34 20.70 339 10 29.62	+ 1.35 + 0.62	+ 1.52 - 0.86	+1 35.86 -1 35.87	+83 51 10.19
8	π Cephei s. p.	E W	3.5 ...	11 2 28.0 11 7 32.0	2 33.2 2 30.8	49.05 50.10	48.60 49.65	..... .....	330 13 25.35 102 31 25.28	+ 0.60 + 1.68	- 2.84 + 2.75	-2 19.38 +2 19.39	+74 53 20.47
9	θ Cephei s. p.	W E	3.5 ...	11 12 2.0 11 17 32.0	2 50.5 2 39.5	49.90 49.00	49.25 48.40	..... .....	109 47 12.75 322 57 37.02	+ 1.38 + 0.49	+ 4.90 - 4.29	+3 25.67 -3 25.70	+67 36 24.56
10	λ Draconis	E W	3 ...	11 23 16.0 11 28 36.0	2 38.7 2 41.3	48.60 50.25	48.30 49.85	..... .....	5 27 43.35 67 17 5.75	+ 0.23 + 1.86	+ 7.17 - 7.41	- 37.10 + 37.09	+69 50 28.67
11	3 Draconis	W E	2.5 ...	11 34 25.0 11 39 55.0	2 53.8 2 36.2	50.40 48.95	49.90 48.55	..... .....	64 42 8.85 8 2 43.68	+ 1.94 + 0.52	-10.44 + 8.43	+ 33.41 - 33.42	+67 15 24.13
12	December 4, L. 3 Draconis s. p.	W E	3.5 ...	23 34 26.0 23 40 12.0	2 52.9 2 53.1	49.65 49.80	50.00 50.20	..... .....	110 8 10.82 322 36 36.72	+ 0.92 + 1.11	+ 5.10 - 5.12	+3 25.26 -3 25.26	+67 15 25.83
13	ω Piscium	E W	2.5 ...	23 52 9.0 23 57 3.0	2 26.5 2 27.5	49.60 49.60	49.10 49.15	..... .....	68 56 26.35 3 48 21.18	+ 0.45 + 0.46	-16.82 +17.04	+ 38.66 - 38.68	+ 6 20 52.53
14	5 Ceti	E W	2 3	0 1 58.0 0 6 37.5	1 31.7 3 7.8	50.25 49.60	49.90 49.25	..... .....	78 14 52.45 354 29 38.32	+ 1.19 + 0.54	- 5.34 +22.39	+ 54.30 - 54.34	- 2 58 0.99
15	δ Piscium	W E	2.5 ...	0 13 4.0 0 18 25.0	2 48.2 2 32.8	49.60 50.45	49.90 50.10	..... .....	5 7 44.42 67 36 58.78	+ 0.86 + 1.39	+22.94 -18.93	- 36.80 + 36.81	+ 7 40 23.53
16	κ Cassiopeiae	W E	2.5 ...	0 25 4.0 0 30 24.0	2 43.2 2 36.8	49.65 50.65	49.55 50.35	..... .....	59 52 11.35 12 52 38.70	+ 0.69 + 1.63	-13.12 +12.11	+ 26.39 - 26.39	+62 25 16.48
17	73 G. Ceti	E W	2.5 3	0 37 17.0 0 42 50.0	2 54.8 2 38.2	50.70 49.45	50.65 49.25	..... .....	97 47 15.00 334 57 32.78	+ 1.81 + 0.46	-13.64 +11.17	+1 51.07 -1 51.05	-22 31 13.59
18	α Sculptoris	W E	4 ...	0 51 28.0 0 56 57.0	2 43.0 2 46.0	49.35 50.90	49.30 50.50	..... .....	327 37 41.45 105 7 5.62	+ 0.42 + 1.84	+10.49 -10.88	-2 35.00 +2 35.00	-29 51 50.26

Time.	Ther- 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below					No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
2 23 40.5	35.6			Instrument in meridian; W. observation at VIII with movable thread; E. observation at VIII with fixed thread.					1	36 22 25.95	.....
2 23 49.5	35.7								2	24.86	.....
2 23 57	35.0								3	25.46	.....
2 24 1	35.0								4	26.57	-25.36
2 24 5	35.1								5	25.94	.....
0 4	35.1								6	25.60	-34.06
0 12	35.8	36.9	29.823						7	26.47	-34.10
1 10 9	36.6								8	26.42	.....
1 10 14	36.7	21.0	29.928						9	26.11	.....
1 10 19.5	36.7								10	26.47	.....
1 10 24	36.7								11	26.48	.....
1 10 53	36.1								12	24.78	.....
1 11	36.1								13	24.32	.....
1 11 8	36.1								14	24.76	-14.00
2 23 2.5	36.1								15	24.74	-17.18
2 23 7.5	36.1								16	25.08	-29.44
2 23 20	36.2	20.8	29.964						17	24.80	-6.25
2 23 35	36.0								18	24.47	.....
4 23 17	29.7	31.1	29.916								
2 23 40.5	29.7										
2 23 5	29.1										
0 2	28.7										
0 16	28.1										
0 28	28.0										
0 12.5	28.0	29.8	29.928								
0 46	28.1										
0 52	28.1										

Note.

1, 2, 4, 14. Very faint; clouds.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	χ Piscium	E	2.5	1 3 56.0	2 34.9	50.90	50.65	.....	54 45 25.12	+ 1.92	-30.23	+ 20.18	+20 32 24.96
		W	...	1 8 45.0	2 14.1	49.50	49.45	.....	17 59 30.15	+ 0.58	+22.67	- 20.19	
2	ω Andromedæ	W	3	1 22 ....	.....	49.20	49.35	26.557	42 21 34.85	- 0.20	- 0.22	+ 6.40	+44 55 40.68
		E	...	.....	.....	51.10	50.95	26.557	30 20 57.80	+ 1.31	+ 0.46	- 6.40	
3	π Piscium	E	3	1 29 21.0	2 52.8	51.00	50.70	.....	63 37 39.82	+ 1.99	-27.09	+ 31.32	+11 39 55.53
		W	...	1 34 56.0	2 42.2	49.30	49.40	.....	9 7 10.38	+ 0.45	+23.87	- 31.31	
4	ζ Ceti	W	3	1 42 23.0	2 41.8	49.10	49.35	.....	346 19 10.80	+ 0.32	+14.21	-1 12.48	-11 8 55.31
		E	...	1 47 27.0	2 22.2	51.30	51.10	.....	86 25 33.30	+ 2.35	-10.98	+1 12.49	
5	53 Cassiopeiæ	E	3	1 53 19.0	2 52.9	51.10	51.10	.....	11 21 22.45	+ 2.24	+13.17	- 28.39	+63 56 33.07
		W	...	1 58 28.0	2 16.1	49.50	49.40	.....	61 23 21.10	+ 0.56	- 8.16	+ 28.41	
6	μ Fornacis	W	4	2 6 8.0	2 44.6	49.30	49.45	.....	326 19 55.65	+ 0.49	+10.46	-2 46.36	-31 9 48.00
		E	...	2 11 24.0	2 31.4	51.25	51.10	.....	106 24 50.22	+ 2.31	- 8.85	+2 46.26	
7	ρ Ceti	E	3	2 18 44.0	2 47.4	51.15	51.00	.....	87 59 21.10	+ 2.22	-14.79	+1 16.70	-12 42 42.77
		W	...	2 24 12.0	2 40.6	49.95	49.55	.....	344 45 28.20	+ 0.86	+13.61	-1 16.68	
8	γ Ceti	W	3	2 35 36.0	2 56.9	49.60	49.50	.....	0 18 3.50	+ 0.64	+22.52	- 44.26	+ 2 50 33.41
	December 7, L.	E	...	2 41 7.0	2 34.1	51.20	51.05	.....	72 26 39.88	+ 2.26	-17.09	+ 44.24	
9	φ Pegasi	W	2.5	23 50 17.0	2 48.5	.....	49.85	.....	22 4 11.18	+ 1.17	+44.33	- 15.60	+24 37 32.03
		E	...	23 55 37.0	2 31.5	.....	51.25	.....	50 40 28.38	+ 2.59	-35.85	+ 15.60	
10	κ ² Sculptoris	E	3	0 4 3.0	2 51.4	49.60	50.30	.....	103 34 44.72	+ 1.67	-11.90	+2 24.78	-28 19 18.12
		W	...	0 9 29.0	2 34.6	48.30	49.10	.....	329 10 4.00	+ 0.44	+ 9.68	-2 24.79	
11	δ Piscium	W	2.5	0 13 21.0	2 31.1	48.00	48.75	.....	5 7 48.90	+ 0.09	+18.52	- 37.13	+ 7 40 23.41
		E	...	0 18 21.5	2 29.4	49.35	50.20	.....	67 36 56.72	+ 1.50	-18.09	+ 37.14	
12	13 Ceti	E	3	0 27 43.0	2 48.1	49.95	50.50	.....	79 23 23.45	+ 1.97	-17.53	+ 57.12	- 4 6 23.95
		W	...	0 33 9.0	2 37.9	48.70	49.45	.....	353 21 24.28	+ 0.79	+15.47	- 57.14	
13	ζ Andromedæ	W	3	0 39 40.0	2 48.1	48.30	48.80	.....	21 12 24.45	+ 0.22	+41.95	- 16.62	+23 45 42.15
		E	...	0 45 4.5	2 36.4	49.50	50.35	.....	51 32 17.48	+ 1.62	-36.32	+ 16.62	
14	h Piscium	E	2.5	0 50 7.0	2 44.8	49.75	50.45	.....	46 48 57.58	+ 1.83	-55.92	+ 11.30	+28 29 25.09
		W	...	0 55 26.5	2 34.7	48.65	49.45	.....	25 55 52.50	+ 0.79	+49.28	- 11.30	
15	τ Piscium	W	2.5	1 6 ....	.....	48.40	48.95	25.737	27 2 31.72	- 0.37	- 0.19	- 10.07	+29 35 48.05
		E	...	.....	.....	49.70	50.40	25.737	45 41 7.38	+ 1.05	+ 0.19	+ 10.07	
16	109 G. Sculptoris	E	3.5	1 16 32.0	2 43.0	49.90	50.50	.....	106 41 1.95	+ 1.94	-10.21	+2 50.02	-31 26 2.86
		W	4	1 22 10.0	2 55.0	48.55	49.35	.....	326 3 41.90	+ 0.67	+11.78	-2 50.07	
17	ν Andromedæ	W	...	1 31 ....	.....	48.45	49.00	26.520	38 22 28.60	- 0.18	- 0.19	+ 2.17	+40 56 29.59
	December 11, L.	E	...	.....	.....	49.50	50.30	26.520	34 20 5.90	+ 1.00	+ 0.19	- 2.17	
18	3 Draconis S. P.	E	4	23 34 40.0	2 39.5	49.50	49.85	.....	322 36 35.02	+ 0.66	- 4.34	-3 26.33	+67 15 24.29
		W	...	23 40 10.0	2 50.5	50.20	50.30	.....	110 8 10.18	+ 1.24	+ 4.96	+3 26.36	
19	φ Pegasi	E	2.5	23 50 24.5	2 41.1	50.00	50.00	.....	50 40 32.42	+ 1.00	-40.53	+ 15.53	+24 37 31.39
		W	...	23 55 40.0	2 34.4	50.40	50.45	.....	22 4 14.38	+ 1.42	+37.22	- 15.53	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
4 0 58	28.1	.....	.....	2. Instrument in meridian; W. observation at VIII; E. observation at IX+4 th with movable thread.						1	36 22 25.10	-18.71
1 7	27.8	.....	.....	15. Instrument in meridian, observation at IX with movable thread.						2	25.48	-23.06
1 20	27.6	.....	.....	17. Instrument in meridian, observation at VIII with movable thread.						3	24.72	.....
1 32	27.2	.....	.....							4	25.00	.....
1 39	.....	28.7	29.918							5	25.68	-22.05
1 45	27.5	.....	.....							6	25.09	.....
1 56	26.7	.....	.....							7	25.61	- 6.59
2 6.5	26.4	.....	.....							8	25.84	.....
2 12	26.7	.....	.....							9	25.90	-23.15
2 22	26.8	.....	.....							10	24.30	- 5.15
2 39	27.4	28.0	29.899							11	23.82	-17.03
7 23 53	26.3	26.7	30.024							12	24.20	.....
0 4.5	25.9	.....	.....							13	24.70	.....
0 10	25.9	.....	.....							14	23.03	-21.65
0 16	25.7	.....	.....							15	24.89	-21.11
0 31	25.4	.....	.....							16	23.99	- 3.03
0 43	25.4	.....	.....							17	24.01	.....
0 53	25.3	25.8	30.026							18	23.88	+31.00
1 5	25.3	.....	.....							19	22.96	-22.91
1 17	25.0	.....	.....							
1 30	24.8	.....	.....							
1 39	24.6	25.9	30.038									
11 23 35	31.8	33.3	30.230									

Notes.

7. Very faint; clouds.
9. Upper level reading rejected.
9-17. Windy.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	κ ² Sculptoris	W E	4 ...	0 4 8.0 0 9 29.0	2 46.4 2 34.6	49.95 49.85	49.95 49.95	..... .....	329 10 0.58 103 34 42.52	+ 0.99 + 0.90	+ 11.21 - 9.68	- 2 24.11 + 2 24.16	- 28 19 17.77
2	ν Andromedæ	E W	2.5 ...	1 31 ..... .....	..... .....	49.85 51.05	49.05 50.45	26.536 26.536	34 20 5.98 38 22 24.48	+ 1.47 + 2.82	+ 0.29 - 0.29	- 2.16 + 2.16	+ 40 56 28.65
3	ε Sculptoris	W E	4.5 4	1 38 38.0 1 44 12.0	2 43.2 2 50.8	50.70 49.30	50.10 48.95	..... .....	331 57 45.05 100 47 0.10	+ 1.78 + 0.44	+ 11.31 - 12.39	- 2 7.11 + 2 7.14	- 25 31 15.28
4	53 Cassiopeiæ	W E	3 ...	1 53 20.0 1 58 43.0	2 51.8 2 31.2	50.95 49.60	50.30 49.05	..... .....	61 23 24.25 11 21 24.65	+ 1.99 + 0.67	- 13.01 + 10.08	+ 28.55 - 28.56	+ 63 56 34.32
5	μ Fornacis	E W	4 ...	2 6 4.0 2 11 30.0	2 48.7 2 37.3	49.55 51.05	49.25 50.45	..... .....	106 24 54.62 326 19 52.25	+ 0.71 + 2.15	- 10.99 + 9.56	+ 2 47.34 - 2 47.41	- 31 9 50.71
6	ρ Ceti	W E	3 ...	2 18 40.0 2 24 11.0	2 51.5 2 39.5	50.75 49.45	50.20 49.20	..... .....	344 45 23.35 87 59 20.48	+ 1.84 + 0.66	+ 15.52 - 13.44	- 1 17.27 + 1 17.29	- 12 42 43.93
7	ν Arietis	E W	3 ...	2 30 39.0 2 36 2.0	2 57.2 2 25.8	49.70 50.80	49.25 50.35	..... .....	53 44 30.50 19 0 29.00	+ 0.78 + 1.92	- 41.53 + 28.11	+ 19.19 - 19.19	+ 21 33 32.30
8	γ Persei	W E	3 ...	2 41 1.0 2 46 29.0	2 58.3 2 29.7	50.55 50.05	49.70 49.40	..... .....	52 57 52.18 19 46 59.90	+ 1.51 + 1.05	- 26.75 + 18.86	+ 18.29 - 18.29	+ 55 30 38.71
9	Dec. 12, L. 35 Piscium	W E	2.5 ...	0 7 12.0 0 12 37.0	3 2.8 2 22.2	48.60 50.85	48.60 50.55	..... .....	5 45 29.90 66 59 6.12	+ 0.33 + 2.47	+ 27.55 - 16.07	- 35.78 + 35.78	+ 8 18 14.00
10	44 Piscium	E W	2.5 ...	0 17 53.0 0 23 8.0	2 48.6 2 26.4	50.90 48.90	50.55 48.65	..... .....	73 51 48.98 358 53 2.38	+ 2.52 + 0.50	- 19.82 + 14.94	+ 46.38 - 46.38	+ 1 25 23.54
11	13 Ceti	W E	3 ...	0 27 37.0 0 33 10.0	2 54.1 2 38.9	48.50 51.00	48.45 50.65	..... .....	353 21 21.30 79 23 22.68	+ 0.20 + 2.61	+ 18.80 - 15.67	- 56.40 + 56.42	- 4 6 24.22
12	5 Andromedæ	E W	3 ...	0 39 34.0 0 45 5.5	2 54.2 2 37.3	49.95 50.60	49.40 50.35	..... .....	51 32 26.52 21 12 27.52	+ 1.39 + 2.22	- 45.04 + 36.74	+ 16.41 - 16.41	+ 23 45 42.25
13	h Piscium	W E	3 ...	0 49 53.5 0 55 26.3	2 58.3 2 34.5	50.20 49.90	49.50 49.40	..... .....	25 55 38.12 46 48 52.68	+ 1.62 + 1.39	+ 5.43 - 49.16	- 11.16 + 11.15	+ 28 29 25.83
14	τ Piscium	E W	2.5 ...	1 6 ..... .....	..... .....	49.90 50.40	49.40 50.15	25.690 25.690	45 41 7.92 27 2 30.48	+ 2.13 + 2.75	+ 0.19 - 0.19	+ 9.94 - 9.94	+ 29 35 48.31
15	109 G. Sculptoris	W E	4 ...	1 16 30.0 1 21 46.0	2 45.0 2 31.0	50.15 49.80	49.80 49.45	..... .....	326 3 39.92 106 41 5.42	+ 1.75 + 1.37	+ 10.47 - 8.77	- 2 47.81 + 2 47.80	- 31 26 3.89
16	ν Persei	E W	2 ...	1 32 ..... .....	..... .....	50.00 50.25	49.45 49.80	26.467 26.467	27 7 12.62 45 35 23.00	+ 2.06 + 2.37	+ 0.24 - 0.24	- 9.85 + 9.85	+ 48 9 31.81
17	ε Sculptoris	E W	3 ...	1 38 40.0 1 44 10.0	2 41.2 2 48.8	49.90 50.20	49.25 49.85	..... .....	100 47 0.22 331 57 44.00	+ 1.31 + 1.80	- 11.03 + 12.10	+ 2 5.92 - 2 5.91	- 25 31 15.37
18	ν Ceti	W E	4 ...	1 52 52.0 1 58 21.0	2 49.3 2 39.7	49.95 49.40	49.70 49.05	..... .....	335 56 44.98 96 47 59.60	+ 1.57 + 0.92	+ 13.00 - 11.57	- 1 46.39 + 1 46.39	- 21 31 54.24

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
11 23 40.5	31.7	...	...	2.14. Instrument in meridian, observation at I with movable thread.	1	36 22 23.28	- 4.64
23 51	31.4	...	...	16. Instrument in meridian, observation at II with movable thread.	2	35.00	...
0 4-5	31.2	...	...		3	23.16	...
0 10	31.0	32.6	30-233		4	24.11	- 23.48
1 10	29.7	...	...		5	24.12	...
1 39	29.7	30.8	30-245		6	24.22	- 5.59
1 57	29.3	...	...		7	24.19	...
2 6.5	28.9	...	...		8	23.38	- 17.51
2 12	28.7	...	...		9	24.85	- 17.00
2 21	28.6	...	...		10	24.75	...
2 14	28.1	...	...		11	24.97	...
2 45	28.0	29.0	30-251		12	24.68	...
12 0 7.5	32.0	34.0	30-060		13	25.04	- 21.68
0 13	31.9	...	...		14	24.72	- 21.10
0 21	31.7	...	...		15	25.08	- 2.14
0 30	31.7	...	...		16	24.82	...
0 41	31.4	...	...		17	24.20	...
0 51	31.4	...	...		18	24.25	...
0 59	...	32.9	30-019				
1 5	31.1	...	...		
1 17	31.0	...	...		
1 22	31.0	...	...		
1 16	30.7	...	...		
1 43	30.5	...	...		
1 44.5	30.7	...	...		
1 51	30.7	...	...		
1 59	30.6	31.7	30-016				
2 9	30.6	...	...		

Note.
p. Paint; haze or clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>a</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ξ ¹ Ceti	E	2.5	2 5 26.5	2 41.7	49.50	49.00	.....	66 52 53.02	+ 0.98	-21.63	+ 35.67	+ 8 24 33.67
	December 18, L.	W	...	2 11 6.5	2 58.3	50.25	49.90	.....	5 51 49.22	+ 1.85	+26.28	- 35.68	
2	36 H. Cephei	E	3	22 52 10.0	3 5.0	50.40	50.10	.....	351 27 28.60	+ 1.06	+ 2.20	-1 1.11	+83 51 9.24
		W	...	22 57 35.0	2 20.0	50.60	50.50	.....	81 17 14.30	+ 1.37	- 1.26	+1 1.15	
3	82 B. Ceti	W	3.5	0 29 48.0	2 49.6	50.45	50.40	.....	332 12 3.98	+ 1.26	+12.26	-2 7.09	-25 16 57.33
		E	...	0 35 17.0	2 39.4	49.80	49.50	.....	100 32 42.02	+ 0.42	-10.83	+2 7.14	
4	147 B. Piscium	E	3	0 40 47.0	2 46.9	49.85	49.45	.....	70 29 15.08	+ 0.44	-21.00	+ 41.88	+ 4 48 4.74
		W	...	0 46 22.0	2 48.1	51.30	50.60	.....	2 15 31.00	+ 1.78	+21.30	- 41.89	
5	72 Piscium	W	3	0 57 18.0	2 56.6	50.60	50.00	.....	11 53 47.68	+ 1.13	+30.93	- 28.17	+14 26 43.62
		E	...	1 2 39.0	2 24.4	49.70	49.20	.....	60 50 50.30	+ 0.22	-20.68	+ 28.17	
6	f Piscium	E	3	1 10 6.0	2 58.0	50.60	49.70	.....	72 9 53.80	+ 0.97	-22.96	+ 44.63	+ 3 7 24.47
		W	...	1 15 47.0	2 43.0	51.20	50.05	.....	0 34 55.65	+ 1.45	+19.25	- 44.65	
7	36 H. Cephei s. p.	E	3	10 52 26.0	2 48.9	51.30	49.05	.....	339 10 31.25	+ 1.95	- 1.54	-1 37.72	+83 51 11.39
		W	...	10 57 26.0	2 11.1	51.05	48.75	.....	93 34 17.15	+ 1.67	+ 0.93	+1 37.73	
8	π Cephei s. p.	W	3	11 2 10.0	2 50.4	51.00	48.55	.....	102 31 20.28	+ 1.58	+ 3.52	+2 22.06	+74 53 41.24
		E	...	11 7 50.0	2 49.6	51.00	48.75	.....	330 13 27.50	+ 1.68	- 3.48	-2 22.10	
9	0 Cephei s. p.	E	3	11 12 50.0	2 2.2	50.85	48.60	.....	322 57 37.40	+ 1.53	- 2.52	-3 29.59	+67 36 25.08
		W	...	11 17 26.0	2 33.8	51.00	48.75	.....	109 47 7.72	+ 1.67	+ 3.99	+3 29.59	
10	3 Draconis	E	3	11 34 28.0	2 52.2	50.55	48.30	.....	8 2 43.28	+ 1.20	+10.25	- 34.03	+67 15 21.67
		W	...	11 39 43.0	2 22.8	51.30	48.95	.....	64 42 1.48	+ 1.90	- 7.05	+ 34.03	
11	Groombridge 4163 s. p.	W	3	11 47 40.0	2 42.5	51.30	48.95	.....	103 30 45.75	+ 1.92	+ 3.36	+2 28.99	+73 53 49.01
		E	...	11 53 0.0	2 37.5	50.45	47.85	.....	329 14 2.92	+ 0.96	- 3.16	-2 29.00	
12	14 H ¹ . Draconis	E	3	11 57 56.0	2 37.4	50.10	47.75	.....	357 53 8.35	+ 0.69	+ 3.68	- 50.21	+77 25 19.50
		W	...	12 2 56.0	2 22.6	51.60	49.00	.....	74 51 38.52	+ 2.13	- 3.02	+ 50.21	
13	6 B. Ursæ Minoris	W	2.5	12 11 40.0	2 32.0	51.30	48.95	.....	85 38 34.32	+ 1.92	- 0.40	+1 13.33	+88 12 41.42
		E	...	12 17 10.0	2 58.0	50.05	47.60	.....	347 6 12.22	+ 0.57	+ 0.55	-1 13.33	
14	κ Draconis	E	2.5	12 26 50.0	2 42.9	49.75	47.30	.....	5 0 22.98	+ 0.27	+ 7.29	- 38.52	+70 17 50.60
		W	...	12 32 10.0	2 37.1	51.40	49.00	.....	67 44 25.82	+ 1.98	- 6.78	+ 38.52	
15	43 H. Cephei s. p.	W	3	12 53 0.0	3 6.0	51.30	48.70	.....	91 39 50.52	+ 1.82	+ 1.32	+1 31.14	+85 45 43.46
		E	...	12 58 48.0	2 42.0	49.75	47.10	.....	341 4 57.35	+ 0.19	- 1.00	-1 31.14	
16	α Ursæ Minoris s. p.	E	2.5	13 17 40.0	8 35.1	49.75	47.10	.....	344 7 53.95	+ 0.21	- 2.94	-1 21.58	+88 48 48.44
		W	...	13 22 40.0	3 35.1	51.50	48.85	.....	88 36 55.05	+ 1.97	+ 0.51	+1 21.56	
17	α Ursæ Minoris s. p.	W	2.5	13 27 40.0	1 24.9	51.40	48.60	.....	88 36 55.62	+ 1.80	+ 0.08	+1 21.55	+88 48 48.65
	December 23, L.	E	...	13 32 50.0	6 34.9	50.40	47.40	.....	344 7 52.60	+ 0.69	- 1.73	-1 21.53	
18	Groombridge 4163	W	2.5	23 47 36.0	2 46.1	50.45	48.55	.....	71 20 15.48	+ 1.47	- 5.67	+ 43.21	+73 53 46.50
		E	...	23 53 18.0	2 55.9	49.80	48.15	.....	1 24 31.10	+ 0.93	+ 6.35	- 43.21	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>	<i>"</i>
12 2 22	.....	31.7	30.010				1	36 22 24.86	.....
18 22 52.5	28.4	29.3	30.254				2	23.16	-34.58
22 58	28.0	.....	.....				3	24.58	.....
0 30	25.4	26.8	30.278				4	24.30	.....
0 35.5	25.2	.....	.....				5	24.79	-17.00
0 44	25.0	.....	.....				6	24.07	.....
1 0	24.7	.....	.....				7	25.71	-34.57
1 14	24.2	26.7	30.284				8	25.52	.....
10 53	16.4	18.0	30.334				9	24.90	.....
10 58	16.4	.....	.....				10	25.53	.....
11 2.5	16.4	.....	.....				11	25.87	.....
11 8	16.3	.....	.....				12	25.18	+33.46
11 13	16.3	.....	.....				13	24.59	.....
11 18	16.3	.....	.....				14	25.78	.....
11 38	16.3	.....	.....				15	25.10	.....
11 51	16.1	16.8	30.336				16	24.36	.....
12 3	16.1	.....	.....				17	24.54	.....
12 12	15.8	.....	.....				18	24.83	.....
12 17.5	15.8	.....	.....				
12 32	15.8	.....	.....				
12 53	15.4	.....	.....				
12 59	15.4	16.1	30.333						
13 18	15.5	.....	.....				
13 26	15.7	.....	.....				
13 33	15.9	16.2	30.344						
23 23 48	18.8	20.0	29.848						
23 58.5	18.7	.....	.....				

Notes.
1. Clouds.
18. Windy.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	14 H ¹ . Draconis S.P.	E	4	23 58 12.0	2 21.8	49.55	47.85	.....	332 45 8.82	+ 0.67	- 2.07	- 2 4.11	+77 25 21.02
		W	...	0 3 14.0	2 40.2	50.50	48.95	.....	99 59 39.12	+ 1.72	+ 2.64	+ 2 4.11	
2	6 B. Ursæ Minoris S.P.	W	2.5	0 11 40.0	2 35.3	50.45	48.55	.....	89 13 2.40	+ 1.48	+ 0.40	+ 1 21.45	+88 12 42.54
		E	...	0 17 10.0	2 54.7	49.50	47.60	.....	343 31 45.92	+ 0.52	- 0.51	- 1 21.45	
3	κ Draconis S. P.	E	4	0 26 42.0	2 51.1	49.40	47.50	.....	325 38 33.00	+ 0.39	- 4.43	- 2 55.37	+70 17 51.44
		W	...	0 32 18.0	2 44.9	50.55	48.95	.....	107 6 15.82	+ 1.73	+ 4.12	+ 2 55.37	
4	147 B. Piscium	W	2.5	0 40 35.0	2 58.7	50.50	48.85	.....	2 15 28.78	+ 1.67	+ 24.08	- 41.89	+ 4 48 4.70
		E	...	0 46 16.5	2 42.8	49.15	47.20	.....	70 29 14.88	+ 0.13	- 19.98	+ 41.89	
5	43 H. Cephei	E	3	0 52 58.0	3 6.6	49.30	47.40	.....	349 33 3.82	+ 0.30	+ 1.50	- 1 5.86	+85 45 42.28
		W	...	0 58 22.0	2 17.4	50.50	48.85	.....	83 11 43.92	+ 1.68	- 0.81	+ 1 5.86	
6	f Piscium	W	3	1 10 11.0	2 52.8	50.10	48.05	.....	0 34 53.78	+ 1.05	+ 21.63	- 44.59	+ 3 7 23.76
		E	...	1 15 41.0	2 37.2	49.90	48.00	.....	72 9 50.40	+ 0.94	- 17.91	+ 44.59	
7	α Ursæ Minoris	E	3	1 22 30.0	3 40.5	50.00	48.10	.....	346 30 4.35	+ 1.05	+ 0.56	- 1 13.28	+88 48 48.46
		W	...	1 27 20.0	1 9.5	50.05	48.10	.....	86 14 41.68	+ 1.04	- 0.06	+ 1 13.26	
8	ν Piscium	W	3	1 33 43.0	2 56.3	49.75	47.45	.....	2 28 21.40	+ 0.55	+ 23.55	- 41.52	+ 5 0 56.04
		E	...	1 39 26.0	2 46.7	50.50	48.15	.....	70 16 23.82	+ 1.29	- 21.06	+ 41.52	
9	Dec. 24, L. 35 Piscium	E	3	0 7 26.0	2 48.8	50.75	48.75	.....	66 59 12.70	+ 1.43	- 23.50	+ 36.72	+ 8 18 13.51
		W	...	0 12 43.0	2 28.2	50.00	47.90	.....	5 45 38.68	+ 0.62	+ 18.11	- 36.72	
10	44 Piscium	W	3	0 17 43.0	2 58.5	49.65	47.45	.....	358 52 56.55	+ 0.20	+ 22.20	- 47.60	+ 1 25 22.95
		E	...	0 23 34.0	2 52.5	51.05	48.90	.....	73 51 50.58	+ 1.08	- 20.74	+ 47.61	
11	82 B. Ceti	E	3.5	0 29 42.0	2 55.4	51.40	49.40	.....	100 32 44.32	+ 2.09	- 13.11	+ 2 7.85	- 25 16 58.86
		W	...	0 35 18.0	2 40.6	49.90	47.60	.....	332 12 6.18	+ 0.43	+ 10.99	- 2 7.85	
12	59 H ¹ . Cassiopeiæ	W	3	0 42 28.0	2 40.9	49.65	47.25	.....	61 11 29.90	+ 0.11	- 11.58	+ 28.72	+63 44 39.26
		E	...	0 47 50.0	2 41.1	51.10	48.80	.....	11 33 17.80	+ 1.65	+ 11.60	- 28.73	
13	72 Piscium	E	3	0 57 29.0	2 45.4	51.65	49.15	.....	60 50 55.10	+ 2.10	- 27.13	+ 28.31	+14 26 43.17
		W	...	1 2 37.0	2 22.6	50.00	47.45	.....	11 53 58.78	+ 0.40	+ 20.17	- 28.31	
14	Dec. 25, L. β Cassiopeiæ	W	3	0 1 35.0	2 41.6	47.85	46.55	.....	56 5 28.18	+ 0.33	- 17.09	+ 21.67	+58 38 24.06
		E	...	0 7 10.0	2 53.4	51.85	50.75	.....	16 39 16.12	+ 4.53	+ 19.68	- 21.68	
15	d Piscium	E	3	0 13 9.0	2 43.2	50.10	48.95	.....	67 37 3.60	+ 2.71	- 21.60	+ 36.69	+ 7 40 21.56
		W	...	0 18 28.0	2 35.8	49.85	48.75	.....	5 7 45.38	+ 2.50	+ 19.68	- 36.72	
16	ε Andromedæ	W	3	0 30 49.5	2 52.6	49.10	48.00	.....	26 14 42.80	+ 1.70	+ 3.02	- 10.82	+28 48 27.13
		E	...	0 36 14.0	2 31.9	50.00	48.95	.....	46 29 51.45	+ 2.68	- 48.83	+ 10.82	
17	59 H ¹ . Cassiopeiæ	E	3	0 42 27.0	2 41.9	49.95	48.95	.....	11 33 17.12	+ 2.64	+ 11.72	- 28.00	+63 44 39.68
		W	...	0 47 33.0	2 24.1	49.95	48.60	.....	61 11 28.00	+ 2.46	- 9.29	+ 28.00	
18	ε Piscium	W	3	0 55 13.0	2 57.7	49.60	48.35	.....	4 50 37.62	+ 2.13	+ 25.41	- 37.14	+ 7 23 18.42
		E	...	1 0 41.0	2 30.3	50.00	48.70	.....	67 54 3.38	+ 2.50	- 18.18	+ 37.15	
19	37 Ceti	E	3	1 6 57.0	2 49.7	49.95	48.70	.....	83 42 23.65	+ 2.49	- 16.43	+ 1 5.68	- 8 25 31.30
		W	...	1 12 23.0	2 36.3	50.05	48.85	.....	349 2 28.22	+ 2.63	+ 13.94	- 1 5.69	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1906 o.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
23 0 3.5	18.7	18.8	29.811		1	36 22 25.45	+ 11.86
0 15	18.7	18.8	29.811		2	25.10	
0 22	18.6	18.8	29.811		3	25.12	
0 33	18.6	18.8	29.811		4	24.78	
0 44	18.4	19.8	29.811		5	25.20	
0 56	18.4				6	24.94	
1 14	18.1				7	24.10	
1 25	18.7				8	24.78	
1 38	18.7	18.9	29.814		9	24.02	- 16.26
24 0 8	19.4	18.2	29.814		10	25.74	
0 21	16.4				11	25.45	
0 30	15.9				12	24.74	- 10.02
0 35.5	15.9				13	24.21	- 10.62
0 45	16.1				14	25.57	
1 1	16.5	15.0	29.810		15	26.12	- 15.29
25 0 5	26.5	25.1	29.699		16	26.41	
0 16	26.0				17	26.42	- 10.42
0 34	25.7				18	26.44	
0 46	26.7				19	27.24	- 8.24
0 58	26.7	26.2	29.706				
1 10	25.4						

Note.
1-8, 13 Windy.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	θ Ceti	W E	3.5	1 16 32.0 1 22 7.0	2 54.3 2 40.7	49.90 49.90	48.60 48.75	..... .....	348 47 57.90 83 56 47.02	+ 2.44 + 2.50	+ 17.26 - 14.68	- 1 6.25 + 1 6.27	- 8 39 58.04
2	ν Persei	W E	3 ...	1 32 ..... .....	..... .....	50.10 49.90	48.70 48.65	26.552 26.552	45 35 22.35 27 7 10.38	+ 2.01 + 1.87	- 0.24 + 0.24	+ 9.86 - 9.86	+ 48 9 32.52
3	54 Ceti	E W	3 ...	1 43 34.0 1 48 18.0	2 25.8 2 18.2	49.85 50.15	48.50 49.00	..... .....	64 42 33.05 8 2 17.10	+ 2.34 + 2.75	- 18.68 + 16.79	+ 32.69 - 32.69	+ 10 34 54.12
4	ν Ceti	E W	3 ...	1 53 18.0 1 58 20.0	2 23.4 2 38.6	49.85 50.10	48.55 48.80	..... .....	96 47 58.90 335 56 45.58	+ 2.36 + 2.64	- 9.33 + 11.41	+ 1 46.54 - 1 46.56	- 21 31 55.86
5	ξ^1 Ceti	W E	3 ...	2 5 16.0 2 10 43.0	2 52.3 2 34.7	49.85 49.85	48.55 48.60	..... .....	5 51 51.48 66 52 51.78	+ 2.40 + 2.40	+ 24.55 - 19.79	- 35.74 + 35.74	+ 8 24 33.12
6	Dec. 26, L. ϵ Andromedæ	E W	3 ...	0 30 47.0 0 36 16.5	2 55.2 2 34.3	49.50 50.30	49.10 49.55	..... .....	46 30 5.90 26 14 53.68	+ 0.10 + 0.76	- 1 4.95 + 50.39	+ 10.76 - 10.76	+ 28 48 27.96
7	κ Draconis	W E	3 ...	12 26 53.0 12 32 27.0	2 40.6 2 53.4	49.60 49.15	48.20 47.95	..... .....	67 44 27.20 5 0 22.08	+ 1.11 + 0.75	- 7.09 + 8.26	+ 37.16 - 37.15	+ 70 17 49.05
8	21 Cassiopeiæ s. p.	E W	3 ...	12 39 24.0 12 43 40.0	0 10.7 4 5.3	49.00 50.00	47.50 48.50	..... .....	329 49 2.05 102 55 39.15	+ 0.46 + 1.49	- 0.01 + 7.43	- 2 19.80 + 2 19.75	+ 74 29 0.61
9	44 H. Cephei s. p.	E W	3 ...	13 3 8.0 13 6 52.0	1 10.7 2 33.3	48.55 50.10	47.20 48.85	..... .....	334 30 33.85 98 14 12.28	+ 0.06 + 1.69	- 0.45 + 2.12	- 1 53.62 + 1 53.56	+ 79 10 58.27
10	α Ursæ Minoris s. p.	W E	3 ...	13 18 0.0 13 23 4.0	8 7.6 3 3.6	50.00 49.05	48.60 47.55	..... .....	88 36 55.78 344 7 50.75	+ 1.53 + 0.52	+ 2.64 - 0.37	+ 1 18.51 - 1 18.49	+ 88 48 50.15

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1906.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
25 1 20	25.3	.....	.....	2. Instrument in meridian, observation at VIII with movable thread.	1	36 22 26.23	.....
1 33	25.1	.....	.....		2	26.58	.....
1 47	25.2	.....	.....		3	26.68	-12.94
1 56	25.1	.....	.....		4	25.77	.....
2 8	25.0	25.7	29.702		5	26.41	.....
26 0 31	31.1	32.7	29.888		6	22.94	.....
12 27	23.4	24.0	29.752	Notes.	7	26.16	.....
12 40	23.6	.....	.....	6 W. Faint; clouds.	8	25.26	.....
12 44	23.7	.....	.....	7. Clouds.	9	24.74	-31.49
13 3.5	23.4	.....	.....		10	25.44	.....
13 7	23.6	.....	.....		
13 18	24.0	.....	.....		
13 27	24.3	.....	.....		
13 37	.....	25.2	29.749				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	January 20, L. ε Piscium	E W	3 ...	0 55 30.0 1 0 49.0	2 39.9 2 39.1	50.00 51.50	48.50 50.00	..... .....	67 54 10.10 4 50 37.75	+ 0.64 + 2.19	-20.58 +20.37	+ 35.57 - 35.59	+ 7 23 16.28
2	37 Ceti	W E	3.5 ...	1 7 29.0 1 12 37.0	2 16.9 2 51.1	50.65 50.50	48.95 49.00	..... .....	349 2 27.20 83 42 27.72	+ 1.21 + 1.16	+10.70 -16.71	-1 2.94 +1 2.95	- 8 25 32.70
3	θ Ceti	E W	3 ...	1 18 8.0 1 22 11.0	1 17.5 2 45.5	50.90 51.60	49.50 49.95	..... .....	83 56 39.25 348 47 53.30	+ 1.63 + 2.25	- 3.41 +15.56	+1 3.53 -1 3.59	- 8 39 59.96
4	ν Piscium	E W	3.5 ...	1 34 9.0 1 39 5.0	2 29.6 2 26.4	50.35 51.95	48.55 50.25	..... .....	70 16 23.92 2 28 22.48	+ 0.85 + 2.55	-16.96 +16.25	+ 39.10 - 39.13	+ 5 0 54.40
5	54 Ceti	W E	3 ...	1 42 59.0 1 48 30.0	3 0.0 2 31.0	51.15 49.95	49.50 48.25	..... .....	8 2 2.88 64 42 38.90	+ 1.79 + 0.50	+28.47 -20.03	- 31.43 + 31.45	+10 34 52.22
6	α Piscium (mean)	E W	3 ...	1 54 32.0 2 0 4.0	2 45.3 2 46.7	50.50 52.35	48.40 50.55	..... .....	72 58 33.22 359 46 12.88	+ 0.85 + 2.91	-19.43 +19.76	+ 43.31 - 43.33	+ 2 18 43.92
7	γ Trianguli	W E	3 ...	2 12 ..... .....	..... .....	51.65 50.00	49.90 48.20	26.853 26.853	30 50 57.70 41 51 12.32	+ 1.64 - 0.07	- 0.14 + 0.14	- 5.63 + 5.63	+33 25 4.56
8	ξ Arietis	E W	3 ...	2 17 22.0 2 22 23.0	2 31.2 2 29.8	50.30 52.40	48.55 50.50	..... .....	65 6 11.45 7 38 34.08	+ 0.82 + 2.91	-19.86 +19.50	+ 32.06 - 32.08	+10 11 16.75
9	ν Arietis	W E	3.5 ...	2 30 36.5 2 36 5.5	2 59.0 2 30.0	51.40 49.90	49.45 48.40	..... .....	19 0 16.45 53 44 23.25	+ 1.85 + 0.55	+42.36 -29.76	- 18.33 + 18.33	+21 33 31.76
10	γ Persei	E W	3 ...	2 41 13.0 2 46 39.0	2 45.3 2 40.7	50.00 52.20	48.40 50.35	..... .....	19 46 52.82 52 57 54.55	+ 0.60 + 2.77	+22.98 -21.73	- 17.47 + 17.47	+55 30 43.84
11	λ Ceti	W E	3 ...	2 52 25.0 2 57 29.0	2 22.3 2 41.7	52.00 49.80	50.20 48.15	..... .....	5 59 30.52 66 45 23.42	+ 2.57 + 0.40	+16.80 -21.70	- 34.39 + 34.41	+ 8 32 6.26
12	94 Ceti	E W	3.5 ...	3 5 6.0 3 10 35.5	2 59.3 2 30.2	50.00 52.80	48.25 50.80	..... .....	76 50 0.80 355 54 53.20	+ 0.51 + 3.28	-21.02 +14.75	+ 50.07 - 50.12	- 1 32 47.84
13	January 21, L. ν Andromedæ	E W	3 ...	0 45 ..... .....	..... .....	51.40 51.70	47.85 48.20	26.403 26.403	34 42 16.12 38 0 29.25	+ 1.51 + 1.85	+ 0.19 - 0.19	- 1.78 + 1.78	+40 34 25.10
14	43 H. Cephei	W E	2.5 ...	0 53 2.0 0 58 0.0	2 53.7 2 4.3	51.60 51.55	48.05 48.00	..... .....	83 11 42.15 349 32 57.78	+ 1.18 + 1.11	- 1.30 + 0.67	+1 5.81 -1 5.84	+85 45 43.84
15	g Piscium	E W	3 ...	1 6 ..... .....	..... .....	51.20 51.50	47.90 48.00	25.842 25.842	44 21 3.52 28 22 27.35	+ 1.45 + 1.79	+ 0.13 - 0.20	+ 8.68 - 8.68	+30 55 50.02
16	ϕ Cassiopeïæ	W E	2.5 ...	1 16 35.0 1 21 56.0	2 49.2 2 31.8	51.10 51.40	47.70 47.95	..... .....	65 5 36.48 7 39 14.12	+ 0.74 + 1.01	- 9.61 + 7.74	+ 33.92 - 33.93	+67 38 53.08
17	40 Cassiopeïæ	E W	2.5 ...	1 28 18.0 1 33 39.0	2 49.4 2 31.0	50.95 51.30	47.55 47.90	..... .....	2 44 7.12 70 0 43.15	+ 0.54 + 0.92	+ 6.58 - 5.27	- 41.22 + 41.23	+72 34 10.28
18	2 Persei	W E	3 ...	1 43 48.0 1 48 39.0	2 29.4 2 21.6	51.30 51.15	47.95 47.80	..... .....	47 47 32.08 24 57 19.68	+ 0.96 + 0.81	-30.55 +27.45	+ 12.53 - 12.53	+50 20 6.58
19	α Piscium (mean)	W E	3 ...	1 54 35.0 1 59 55.0	2 42.2 2 37.8	51.10 51.20	47.60 47.65	..... .....	359 46 21.12 72 58 28.72	+ 0.65 + 0.73	+18.71 -17.70	- 46.06 + 46.09	+ 2 18 45.07
20	γ Trianguli	E W	2.5 ...	2 12 ..... .....	..... .....	51.10 51.45	47.60 47.85	26.870 26.870	41 51 10.32 30 50 56.85	+ 1.40 + 1.71	+ 0.22 - 0.22	+ 5.98 - 5.98	+33 25 4.00

Time.	Ther. 3802.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m s</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
20 0 56	44.9			7. Instrument in meridian, observation at VII with movable thread.					1	36 22 25.22	
1 1		46.7	29.639	11. Instrument in meridian, observation at II with movable thread.					2	26.64	+12.57
1 10	44.6			14. Instrument in meridian, observation between fixed thread and movable at 24.100 rev.					3	24.26	
1 23	41.9			15. Instrument in meridian, E. observation at II. W. observation at I with movable thread.					4	24.53	
1 37	41.6			20. Instrument in meridian, observation at I with movable thread.					5	26.26	+ 6.47
1 49	41.0	44.3	29.678						6	25.08	+ 9.54
1 58	42.8								7	26.10	
2 10	42.3								8	24.44	+ 6.97
2 23	41.7								9	27.15	
2 31	41.6	42.8	29.712						10	26.00	- 2.15
2 44	41.3								11	26.02	+ 7.85
2 56	40.9								12	25.74	+11.20
3 1	40.1	42.1	29.716						13	26.46	
3 11	39.0	26.1	30.233						14	26.20	
3 21	38.3								15	26.10	- 0.01
3 31	37.1								16	25.74	-10.94
3 41	36.0								17	26.12	
3 51	34.8								18	25.72	- 6.60
4 1	33.6								19	26.11	+ 9.63
4 11	32.4								20	26.41	

Notes.
1-12. High wind.
13, 15. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	ξ Arietis	W	3	2 17 3.0	2 50.1	51.35	47.70	.....	7 38 32.78	+ 0.84	+25.14	- 34.05	+10 11 16.65
		E	...	2 22 20.5	2 27.4	51.15	47.60	.....	65 6 9.15	+ 0.66	-18.88	+ 34.04	
2	ν Ceti	E	3	2 28 3.0	2 59.9	51.15	47.60	.....	70 6 17.35	+ 0.67	-24.62	+ 41.46	+ 5 11 7.34
		W	...	2 33 40.5	2 37.6	51.85	48.25	.....	2 38 37.15	+ 1.38	+18.90	- 41.46	
3	39 Arietis	W	3	2 39 39.8	2 45.8	51.50	47.95	.....	26 18 1.12	+ 1.08	+58.44	- 11.05	+28 51 40.15
		E	...	2 44 45.8	2 20.2	51.50	47.85	.....	46 26 32.60	+ 1.00	-41.80	+ 11.05	
4	λ Ceti	E	3	2 51 59.0	2 48.2	51.60	48.00	.....	66 45 22.08	+ 1.14	-23.47	+ 36.46	+ 8 32 6.21
		W	...	2 57 22.0	2 34.8	52.15	48.40	.....	5 59 30.02	+ 1.63	+19.88	- 36.46	
5	94 Ceti	W	3	3 5 7.0	2 58.2	51.20	47.60	.....	355 54 53.40	+ 0.71	+20.76	- 53.00	- 1 32 47.04
		E	...	3 10 34.0	2 28.8	51.80	48.05	.....	70 49 49.70	+ 1.28	-14.47	+ 52.99	
6	2 H. Camelop.	E	3	3 18 42.0	2 54.0	51.55	47.90	.....	15 40 39.40	+ 1.04	+18.38	- 23.49	+59 37 7.46
	January 22, L.	W	...	3 24 19.0	2 43.0	51.55	47.85	.....	57 4 8.32	+ 1.00	-16.13	+ 23.49	
7	43 H. Cephei s. p.	E	2.5	12 52 56.0	2 59.3	49.40	47.90	.....	341 5 0.45	+ 0.75	- 1.23	-1 30.47	+85 45 46.32
		W	...	12 58 30.0	2 34.7	51.40	49.45	.....	91 39 49.30	+ 2.60	+ 0.91	+1 30.51	
8	ψ Cassiopeia s. p.	W	3	13 16 24.0	3 0.1	51.05	48.65	.....	109 44 41.40	+ 1.97	+ 5.46	+3 28.18	+67 38 52.16
		E	...	13 22 0.0	2 35.9	49.40	47.45	.....	323 0 6.70	+ 0.48	- 4.09	-3 28.22	
9	40 Cassiopeia s. p.	E	3	13 28 4.0	3 3.3	49.35	47.40	.....	327 54 37.42	+ 0.45	- 4.59	-2 38.38	+72 34 12.15
		W	...	13 33 52.0	2 44.7	50.95	48.80	.....	104 50 12.92	+ 1.98	+ 3.71	+2 38.46	
10	i Draconis	W	3	13 45 56.0	2 49.9	50.45	48.05	.....	62 37 31.12	+ 1.39	-11.62	+ 31.05	+65 10 42.57
		E	...	13 51 16.0	2 30.1	49.95	47.85	.....	10 7 21.30	+ 1.02	+ 9.07	- 31.06	
11	55 Cassiopeia s. p.	E	3.5	14 4 16.0	2 57.9	49.70	47.70	.....	321 27 9.15	+ 0.80	- 5.63	-3 50.63	+66 5 31.19
		W	...	14 9 47.0	2 33.1	50.65	48.40	.....	111 17 41.08	+ 1.67	+ 4.17	+3 50.86	
12	142 H ¹ . Cephei s. p.	W	3.5	14 31 20.0	3 4.3	50.05	47.75	.....	96 21 44.18	+ 1.03	+ 2.58	+1 49.04	+81 3 32.83
		E	...	14 37 1.0	2 36.7	50.00	47.70	.....	336 23 6.00	+ 0.95	- 1.87	-1 49.06	
13	β Ursæ Minoris	E	2.5	14 48 8.0	2 52.0	49.85	47.40	.....	0 46 27.52	+ 0.71	+ 5.75	- 45.23	+74 31 54.77
	January 23, L.	W	...	14 53 52.0	2 52.0	50.35	48.20	.....	71 58 23.88	+ 1.37	- 5.75	+ 45.24	
14	γ Cassiopeia	W	3	0 48 4.0	3 4.1	51.10	48.85	.....	57 39 59.82	+ 2.21	-19.67	+ 24.38	+60 12 56.87
		E	...	0 53 24.0	2 15.9	49.95	47.75	.....	15 4 59.18	+ 1.03	+10.73	- 24.39	
15	142 H ¹ . Cephei	E	3	2 31 28.0	2 56.2	49.45	47.50	.....	354 15 6.78	+ 0.65	+ 3.06	- 56.78	+81 3 29.99
		W	...	2 37 6.0	2 41.8	51.00	49.20	.....	78 29 43.62	+ 2.33	- 2.58	+ 56.78	
16	β Ursæ Minoris s. p.	W	3.5	2 48 22.0	2 38.0	50.90	48.55	.....	102 52 45.38	+ 1.92	+ 3.08	+2 23.79	+74 31 56.17
		E	...	2 53 46.0	2 46.0	49.95	47.65	.....	329 52 6.40	+ 0.95	- 3.40	-2 23.90	
17	ζ Arietis	E	3	3 6 43.0	2 53.8	50.05	48.30	.....	54 36 2.08	+ 1.32	-38.32	+ 20.73	+20 41 56.77
		W	...	3 12 19.0	2 42.2	51.30	49.35	.....	18 8 50.62	+ 2.54	+33.38	- 20.73	
18	2 H. Camelop.	W	2.5	3 18 39.0	2 57.0	51.05	48.70	.....	57 4 9.82	+ 2.06	-19.02	+ 23.80	+59 37 7.00
		E	...	3 24 17.0	2 41.0	50.20	47.80	.....	15 40 43.08	+ 1.18	+15.74	- 23.80	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° / "</i>	<i>"</i>
21 2 10	22.6	...	...						1	36 22 24.84	+ 7.07
2 20	22.3	...	...						2	25.42	.....
2 31	22.6	24.8	30.254						3	26.22	+ 0.82
2 43	21.8	...	...						4	25.64	+ 7.93
2 54	21.8	...	...						5	25.68	+11.39
3 8	22.0	...	...						6	26.00	.....
3 22	22.1	23.8	30.252						7	26.41	.....
22 12 52	16.1	18.7	30.156						8	25.94	-10.83
13 3	15.8	...	...						9	25.98	.....
13 17	15.5	...	...						10	26.14	+13.85
13 26	15.4	...	...						11	25.74	.....
13 34	15.1	...	...						12	26.42	-12.34
13 52	14.8	15.9	30.162						13	26.74	.....
14 5	14.8	...	...						14	26.64	.....
14 10	14.4	...	...						15	26.93	-12.37
14 32	13.8	...	...						16	27.11	.....
14 37	13.8	...	...						17	25.81	.....
14 53	13.7	15.4	30.188						18	26.43	.....
23 0 51	18.4	19.7	30.194	Note.							
2 34	16.8	18.3	30.218	14. Clouds.							
2 49	16.8	...	...						
2 54	16.4	...	...						
3 10	16.0	...	...						
3 25	15.8	...	...						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	11 H ¹ . Camelop.	E W	3 ...	3 31 15.0 3 36 47.0	2 53.8 2 38.2	50.45 51.45	47.90 48.90	.....	12 22 51.65 60 21 56.52	+ 1.37 + 2.42	+14.34 -11.89	- 28.05 + 28.07	+62 55 4.67
2	9 H. Camelop.	W E	3 ...	3 46 12.0 3 51 51.0	3 4.3 2 34.7	51.05 50.10	48.65 47.85	.....	58 17 20.70 14 27 33.82	+ 2.06 + 1.18	-18.82 +13.26	+ 25.37 - 25.37	+60 50 19.98
3	A Tauri	E W	3 ...	3 56 21.0 4 1 52.0	2 54.5 2 36.5	50.45 51.40	48.00 48.85	.....	53 28 25.80 19 16 31.25	+ 1.39 + 2.32	-40.80 +32.83	+ 19.41 - 19.41	+21 49 37.37
4	A Eridani	W E	3.5 ...	4 7 10.0 4 12 38.0	2 52.1 2 35.9	50.70 50.45	48.50 48.10	.....	346 58 40.00 85 46 8.15	+ 1.78 + 1.44	+16.28 -13.36	-1 13.54 +1 13.55	-10 29 25.86
5	January 26, L. Cassiopeia	E W	3 ...	0 48 13.0 0 53 39.5	2 54.8 2 31.7	51.00 50.00	49.90 48.70	.....	15 4 50.62 57 39 54.25	+ 2.27 + 1.19	+17.73 -13.36	- 23.80 + 23.80	+60 12 56.29
6	δ Cassiopeia	E W	3 ...	1 17 10.0 1 22 13.0	2 36.2 2 26.8	51.95 49.50	50.45 48.00	.....	15 32 32.30 57 12 15.72	+ 3.04 + 0.52	+14.67 -12.95	- 23.27 + 23.28	+59 45 16.68
7	40 Cassiopeia	W E	3 ...	1 28 28.0 1 33 30.0	2 38.8 2 23.2	49.30 51.90	48.00 50.45	.....	70 0 39.25 2 44 1.28	+ 0.42 + 3.08	- 5.78 + 4.70	+ 40.73 - 40.74	+72 34 9.91
8	ο Piscium	E W	3 ...	1 38 7.0 1 42 48.0	2 24.7 2 16.3	51.90 49.50	50.40 47.80	.....	66 36 3.70 6 8 45.70	+ 2.97 + 0.44	-17.45 +15.48	+ 35.71 - 35.73	+ 8 41 17.24
9	ι Draconis S. P.	W E	4 ...	1 47 8.0 1 52 30.0	1 37.9 3 44.1	49.20 52.10	47.45 50.40	.....	112 12 23.95 320 32 32.28	+ 0.10 + 3.10	+ 1.76 - 9.23	+3 59.18 -3 59.23	+65 10 44.20
10	55 Cassiopeia	E W	3.5 ...	2 4 31.0 2 9 38.0	2 42.5 2 24.5	49.65 51.15	48.40 49.55	.....	9 12 35.08 63 32 13.68	+ 0.82 + 2.16	+ 9.95 - 7.86	- 31.51 + 31.53	+66 5 29.34
11	ν Ceti	W E	3 ...	2 28 23.0 2 33 50.0	2 39.6 2 47.4	50.40 50.25	48.90 48.90	.....	2 38 36.62 70 6 14.22	+ 1.46 + 1.37	+19.38 -21.32	- 41.08 + 41.11	+ 5 11 7.26
12	39 Arietis	E W	2.5 ...	2 39 40.5 2 44 48.5	2 44.8 2 23.2	51.00 51.00	49.15 49.15	.....	46 26 46.55 26 18 12.72	+ 1.90 + 1.88	-57.73 +43.60	+ 10.95 - 10.95	+28 51 39.55
13	January 28, L. Cassiopeia	W E	2.5 ...	1 17 7.5 1 22 34.5	2 38.5 2 48.5	50.45 50.40	48.50 48.30	.....	57 12 16.98 15 32 31.70	+ 0.96 + 0.84	-15.10 +17.06	+ 23.33 - 23.35	+59 45 16.71
14	ο Piscium	W E	3 ...	1 37 51.0 1 42 53.0	2 40.5 2 21.5	50.50 49.90	48.50 47.95	.....	6 8 38.08 66 36 5.70	+ 1.01 + 0.38	+21.46 -16.68	- 35.78 + 35.78	+ 8 41 16.55
15	ι Draconis S. P.	E W	3 ...	1 48 28.0 1 53 48.0	0 17.8 5 2.2	49.70 51.20	47.95 49.30	.....	320 32 19.32 112 12 2.30	+ 0.29 + 1.74	- 0.06 +16.77	-3 59.47 +3 59.46	+65 10 43.15
16	55 Cassiopeia	W E	2.5 ...	2 4 7.0 2 10 1.0	3 6.2 2 47.8	51.15 49.80	49.30 48.00	.....	63 32 19.72 9 12 33.58	+ 1.73 + 0.38	-13.06 +10.60	+ 31.55 - 31.55	+66 5 30.21
17	κ Fornacis	E W	3 ...	2 15 38.0 2 21 7.0	2 41.9 2 47.1	49.90 51.10	48.00 49.25	.....	99 30 29.45 333 14 19.42	+ 0.43 + 1.67	-11.37 +12.11	+2 0.92 -2 0.94	-24 14 36.83
18	142 H ¹ . Cephei	W E	3 ...	2 31 22.0 2 37 2.0	3 1.2 2 38.8	50.85 50.00	49.05 47.95	.....	78 29 45.95 354 15 4.88	+ 1.51 + 0.49	- 3.23 + 2.48	+ 55.62 - 55.63	+81 3 30.57
19	β Fornacis	E W	3 ...	2 42 29.0 2 47 58.0	2 45.8 2 43.2	50.00 51.15	47.95 49.20	.....	108 2 54.48 324 41 55.08	+ 0.48 + 1.74	-10.33 +10.00	+3 4.22 -3 4.23	-32 48 6.38

Time.	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
21 3 10	15.1	17.8	30.274	7.15. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.				1	36 22 27.22	- 7.74
3 49	15.4	...	...					2	26 10	
3 59	14.9	...	...					3	26 40	
4 11	14.8	16.2	30.274					4	27 15	613.96
26 0 47	25.1	26.7	29.994					5	26 15	
0 54	26.0	...	...					6	26 66	
1 26	24.4	...	...					7	26 98	
1 30	21.9	...	...					8	25 41	
1 49	21.4	...	...					9	25 96	+ 14.08
1 56	21.0	...	...					10	26 92	
1 52	21.0	24.0	29.922					11	25 88	
2 7	22.7	...	...					12	24 46	+ 1.00
2 11	21.8	...	...					13	26 27	
2 44	21.3	21.3	29.943					14	24 98	
2 18	22.1	...	...	9 W One microscope reading increased 10".				15	25 68	+ 14.21
1 23	27.0	28.2	30.168	9 E Clock time increased 1".				16	26 48	
1 41	26.4	...	...	15 Very faint				17	25 84	
1 49	26.4	...	...					18	26 04	- 12.67
1 54	26.1	...	...					19	25 72	
2 7	26.0	...	...					
2 18	26.0	27.5	30.181							
2 17	25.7	...	...					

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Ceti	W	3	2 54 35.0	2 53.0	50.95	49.00	.....	1 10 51.32	+ 1.50	+21.99	- 43.44	+ 3 43 21.75
		E	...	3 0 4.0	2 36.0	49.95	47.95	.....	71 33 55.32	+ 0.49	-17.88	+ 43.44	
2	ζ Arietis.	W	2.5	3 6 42.5	2 53.8	50.95	49.00	.....	18 8 45.88	+ 1.49	+38.32	- 20.30	+20 41 56.57
		E	...	3 12 18.0	2 41.7	49.95	48.00	.....	54 35 58.20	+ 0.44	-33.18	+ 20.30	
3	σ Persei	E	2	3 24 ....	.....	49.75	47.95	26.040	27 36 29.22	+ 1.05	+ 0.37	- 9.50	+47 40 33.23
		W	...	.....	.....	51.75	49.85	26.040	45 6 41.92	+ 3.06	- 0.37	+ 9.50	
4	η H ¹ . Camelop.	W	2.5	3 31 18.0	2 50.3	51.40	49.50	.....	60 21 59.35	+ 1.94	-13.77	+ 27.45	+62 55 5.30
		E	...	3 36 45.0	2 36.7	49.85	47.90	.....	12 22 53.28	+ 0.37	+11.67	- 27.45	
5	τ Eridani	E	...	3 41 4.0	2 39.0	49.90	47.90	.....	99 25 53.95	+ 0.44	-10.97	+2 0.91	-24 10 2.18
		W	...	3 46 36.0	2 53.0	51.60	49.75	.....	333 18 52.20	+ 2.22	+12.99	-2 0.94	
6	Δ Tauri	W	2.5	3 56 16.0	2 59.1	50.95	49.10	.....	19 16 21.70	+ 1.53	+42.98	- 19.00	+21 49 37.72
		E	...	4 1 45.8	2 30.7	49.80	48.00	.....	53 28 16.35	+ 0.37	-30.44	+ 18.99	
7	Δ Eridani	E	2.5	4 7 11.0	2 50.6	49.70	48.00	.....	85 46 12.48	+ 0.31	-16.00	+1 11.94	-10 29 26.03
		W	...	4 12 37.0	2 35.4	51.45	49.65	.....	340 58 39.78	+ 2.07	+13.26	-1 11.94	
8	ϵ Camelop.	W	2.5	4 21 49.0	2 54.4	51.35	49.45	.....	51 9 59.05	+ 1.98	-29.91	+ 16.32	+53 42 38.02
		E	...	4 27 28.0	2 44.6	49.05	47.90	.....	21 34 54.30	+ 0.27	+26.65	- 16.32	
9	δ Camelop.	E	2.5	4 37 23.0	2 56.1	49.55	47.80	.....	18 42 0.02	+ 0.20	+23.87	- 19.70	+56 35 38.64
		W	...	4 42 55.0	2 35.9	51.85	49.95	.....	54 2 44.75	+ 2.43	-18.71	+ 19.70	
10	α Ursæ Minoris S. P.	E	2	13 17 40.0	7 49.8	49.50	47.55	.....	344 7 56.78	+ 0.55	- 2.45	-1 20.56	+88 48 52.31
		W	...	13 22 40.0	2 49.8	51.05	49.65	.....	88 36 52.58	+ 2.69	+ 0.32	+1 20.61	
11	γ Cassiopeiæ S. P.	W	3	13 27 54.0	3 12.3	50.45	48.45	.....	104 50 14.60	+ 1.45	+ 5.06	+2 37.41	+72 34 11.42
		E	...	13 33 54.0	2 47.7	50.95	49.10	.....	327 54 34.12	+ 2.04	- 3.85	-2 37.45	
12	δ Draconis	E	2.5	13 46 7.0	2 38.9	49.85	48.15	.....	10 7 20.12	+ 1.03	+10.17	- 30.85	+65 10 42.21
		W	...	13 51 26.0	2 40.1	50.60	48.85	.....	62 37 29.08	+ 1.77	-10.32	+ 30.86	
13	α Draconis	W	2.5	14 0 6.0	1 49.1	51.05	49.00	.....	62 15 40.72	+ 2.03	- 4.92	+ 30.38	+64 48 59.20
		E	...	14 4 41.0	2 45.9	50.45	48.75	.....	10 29 0.75	+ 1.62	+11.38	- 30.39	
14	ϵ Cassiopeiæ S. P. (brightest)	E	3	14 18 30.0	2 56.4	49.40	47.75	.....	322 20 40.98	+ 0.57	- 5.37	-3 36.18	+66 59 16.63
		W	...	14 25 41.0	4 14.6	50.90	48.95	.....	110 24 3.98	+ 1.92	+11.18	+3 36.15	
15	γ H ¹ . Cephei S. P.	E	2.5	14 31 20.0	3 2.7	49.70	47.85	.....	336 23 5.72	+ 0.78	- 2.54	-1 48.21	+81 3 32.49
		W	...	14 37 10.0	2 47.3	51.25	49.15	.....	96 21 44.70	+ 2.26	+ 2.13	+1 48.17	
16	β Ursæ Minoris	W	2.5	14 47 54.0	3 6.2	51.15	49.15	.....	71 58 23.60	+ 2.16	- 6.74	+ 44.85	+74 31 54.25
		E	...	14 53 55.0	2 54.8	50.05	48.00	.....	0 46 26.78	+ 1.02	+ 5.94	- 44.86	
17	δ H. Cephei S. P.	W	2.5	15 5 36.0	2 57.3	51.05	49.10	.....	100 1 1.92	+ 2.12	+ 3.24	+2 6.05	+77 23 50.81
		E	...	15 11 18.0	2 44.7	49.65	47.90	.....	332 43 36.52	+ 0.80	- 2.80	-2 6.07	
18	α Arietis	E	3	1 59 4.2	2 53.6	50.95	49.05	.....	52 16 46.48	+ 1.48	-42.94	+ 17.29	+23 1 19.17
		W	...	2 4 36.5	2 38.7	50.65	48.75	.....	20 28 7.42	+ 1.18	+35.89	- 17.30	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
23 2 43	25.3	.....	.....	3. Instrument in meridian, observation at I with movable thread.	1	36 22 26.37	.....
2 54	25.3	.....	.....	17. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	2	25.58	.....
2 57	25.3	.....	.....		3	24.98	- 4.45
3 10	25.1	.....	.....		4	26.42	- 8.19
3 22	25.0	.....	.....		5	25.40	+18.52
3 35	24.7	25.9	30.187		6	26.24	.....
3 42	24.7	.....	.....		7	25.95	+14.40
3 54	24.4	.....	.....		8	26.17	- 4.63
3 59	24.4	.....	.....		9	26.28	.....
4 10	24.3	.....	.....		10	25.26	.....
4 25	24.0	.....	.....		11	26.69	.....
4 41	23.8	25.3	30.189		12	25.93	+14.36
30 13 17	20.3	21.8	30.282		13	25.81	.....
13 28	20.0	.....	.....		14	26.62	.....
13 38	19.8	.....	.....		15	26.50	-12.79
13 49	19.6	.....	.....		16	26.38	.....
14 5	19.4	.....	.....		17	26.40	.....
14 19	19.2	.....	.....		18	24.75	.....
14 26	19.3	.....	.....		
14 32	18.9	.....	.....		
14 38	19.2	20.3	30.291				
14 52	19.0	.....	.....		
15 6	18.9	.....	.....		
15 12	18.8	19.7	30.294				
5 1 58	24.7	27.5	29.683				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	Cassiopeia (brightest)	W	3	2 20 26.0	0 59.7	50.35	48.55	.....	64 25 46.48	+ 0.95	- 1.26	+ 32.41	+66 59 15.39
		E	...	2 24 50.0	3 24.3	50.90	49.25	.....	8 18 37.42	+ 1.56	+14.71	- 32.44	
2	δ Ceti	E	3.5	2 32 2.0	2 43.1	50.85	49.10	.....	75 21 40.35	+ 1.48	-17.94	+ 49.31	- 0 4 30.97
		W	...	2 37 16.0	2 30.9	50.55	48.60	.....	357 23 10.72	+ 1.05	+15.37	- 49.33	
3	β Fornacis	W	4.5	2 42 30.0	2 44.2	50.40	48.50	.....	324 41 48.32	+ 0.95	+10.13	-3 2.55	-32 48 7.38
		E	...	2 47 52.0	2 37.8	51.05	49.25	.....	108 2 50.12	+ 1.64	- 9.35	+3 2.66	
4	α Ceti	E	3.5	2 54 28.0	2 59.4	51.05	49.15	.....	71 34 0.58	+ 1.56	-23.65	+ 43.05	+ 3 43 21.37
		W	...	2 59 49.0	2 21.6	50.40	48.80	.....	1 10 58.05	+ 1.08	+14.73	- 43.04	
5	48 H. Cephei	E	3	3 5 25.0	3 7.4	51.00	49.25	.....	357 54 34.92	+ 1.60	+ 5.22	- 48.51	+77 23 49.37
		W	...	3 11 6.0	2 33.6	50.55	48.90	.....	74 50 12.32	+ 1.19	- 3.51	+ 48.52	
6	σ Persei	W	2.5	3 24 .....	.....	50.00	48.10	26.187	45 6 39.82	- 0.23	- 0.37	+ 9.41	+47 40 33.05
		E	...	.....	.....	50.95	49.10	26.187	27 36 24.28	+ 0.76	+ 0.37	- 9.41	
7	δ Eridani	W	3.5	3 36 3.0	2 47.2	49.95	48.05	.....	347 23 10.48	+ 0.47	+15.48	-1 10.26	-10 4 53.93
		E	...	3 41 28.0	2 37.8	51.15	49.40	.....	85 21 39.20	+ 1.78	-13.78	+1 10.29	
8	9 H. Camelop.	E	3	3 46 25.0	2 50.0	51.15	49.50	.....	14 27 28.32	+ 1.83	+16.01	- 24.65	+60 50 20.96
		W	...	3 51 55.0	2 40.0	50.50	48.70	.....	58 17 18.40	+ 1.08	-14.18	+ 24.67	
9	174 G. Eridani	W	3.5	3 59 20.0	2 30.2	50.10	48.30	.....	329 34 42.92	+ 0.66	+ 9.20	-2 22.26	-27 54 39.23
		E	...	4 4 25.0	2 34.8	51.55	49.60	.....	103 10 7.82	+ 2.05	- 9.77	+2 22.34	
10	α ² Eridani	E	3.5	4 8 12.0	2 50.3	51.85	49.60	.....	83 4 54.52	+ 2.22	-16.75	+1 5.07	- 7 48 3.09
		W	...	4 13 43.0	2 40.7	50.75	48.70	.....	349 39 54.35	+ 1.23	+14.92	-1 5.07	
11	1 Camelop.	E	3	4 21 51.0	2 51.7	51.30	49.35	.....	21 34 50.15	+ 1.82	+28.99	- 16.21	+53 42 37.91
		W	...	4 27 24.5	2 41.8	50.50	48.45	.....	51 9 55.68	+ 0.97	-25.75	+ 16.21	
12	4 Camelop.	W	3	4 37 25.5	2 52.0	50.70	48.50	.....	54 2 50.92	+ 1.08	-23.00	+ 19.57	+56 35 39.51
	February 6, L.	E	...	4 42 52.0	2 33.6	51.20	49.20	.....	18 42 2.78	+ 1.66	+18.16	- 19.58	
13	α Trianguli	E	2	1 48 .....	.....	51.20	50.05	26.270	46 9 0.32	+ 1.55	+ 0.18	+ 10.60	+29 7 32.49
		W	...	.....	.....	51.05	49.75	26.270	26 33 53.60	+ 2.22	- 0.88	- 10.60	
14	α Arietis	W	2.5	1 50 7.0	2 50.0	50.75	49.45	.....	20 28 3.12	+ 0.26	+41.62	- 17.67	+23 1 19.17
		E	...	2 4 33.8	2 35.9	51.50	50.20	.....	52 16 38.38	+ 1.04	-34.64	+ 17.68	
15	α Ceti	E	3	2 12 8.0	2 33.1	51.55	50.10	.....	78 41 8.92	+ 1.03	-14.75	+ 56.49	- 3 24 9.72
		W	...	2 17 3.0	2 21.9	51.55	50.05	.....	354 3 41.62	+ 1.02	+12.67	- 56.52	
16	ξ ² Ceti	W	2.5	2 20 54.0	2 21.1	51.40	49.85	.....	5 29 56.45	+ 0.85	+16.30	- 37.14	+ 8 2 28.05
		E	...	2 25 26.0	2 10.9	51.65	50.35	.....	67 14 49.48	+ 1.20	-14.03	+ 37.16	
17	δ Ceti	W	3	2 32 8.0	2 37.2	51.30	49.85	.....	357 23 10.45	+ 0.77	+16.66	- 50.35	- 0 4 31.31
		E	...	2 37 21.0	2 35.8	51.80	50.45	.....	75 21 38.25	+ 1.34	-16.37	+ 50.38	
18	β Ursæ Minoris S. P.	E	3	2 48 10.0	2 50.5	51.15	50.05	.....	329 52 2.20	+ 0.82	- 3.58	-2 22.63	+74 31 54.51
		W	...	2 53 58.0	2 57.5	51.75	50.55	.....	102 52 46.38	+ 1.35	+ 3.88	+2 22.71	
19	ι Persei	W	2.5	2 59 40.0	2 43.6	51.50	50.20	.....	46 43 12.98	+ 1.05	-41.28	+ 11.40	+49 15 35.43
		E	...	3 4 34.5	2 10.9	51.15	49.80	.....	26 1 51.05	+ 0.68	+26.43	- 11.40	

Time	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>			<i>° ' "</i>	<i>"</i>
5 2 25	21.2		29.797	1. 3. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	1	36 22 25.42	.....
2 35	22.6			6. Instrument in meridian, observation at 1X with movable thread.	2	25.50	.....
2 43	22.0			14. Instrument in meridian; E. observation at 1; W. observation at 1+30° with movable thread.	3	26.42	.....
2 48	21.8	24.9			4	26.18	.....
2 52	22.0				5	26.88	.....
3 5	21.7				6	26.50	- 4.48
3 22	21.7				7	26.81	.....
3 39	21.1				8	26.74	.....
3 50	20.6				9	26.48	+19.86
3 56		22.7	29.780		10	26.74	.....
4 0	20.4				11	25.91	- 5.32
4 5	26.7				12	25.80	.....
4 25	26.1				13	25.26	.....
4 41	25.0	21.7	29.760	Notes	14	25.90	.....
1 46	21.7	22.7	30.078	1. 16. Very faint.	15	25.74	.....
2 2	20.7			Diffuse and faint.	16	25.14	.....
2 14	20.0			8 E. One microscope reading increased 10".	17	25.56	.....
2 23	19.7			12. Very faint; clouds.	18	25.56	.....
2 31	19.0				19	25.46	- 5.10
2 46	18.6	19.6	30.088				
2 52	18.2						
3 2	18.0						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	H ¹ . Camelop.	E	3	3 8 30.0	3 20.3	51.00	49.75	.....	9 59 1.92	+ 0.56	+16.00	- 30.98	+65 18 55.02
		W	...	3 14 42.0	2 51.7	51.55	50.35	.....	62 45 43.70	+ 1.16	-11.76	+ 30.98	.....
2	ξ Tauri	W	3	3 19 16.0	2 54.3	51.30	50.10	.....	6 51 42.18	+ 0.91	+25.81	- 35.34	+ 9 24 24.07
		E	...	3 24 45.5	2 35.2	50.85	49.55	.....	65 53 3.60	+ 0.39	-20.46	+ 35.34	.....
3	149 H ¹ . Cephei	E	2.5	3 32 0.0	4 19.4	50.75	49.45	.....	348 57 14.48	+ 0.29	+ 2.47	-1 7.94	+86 21 32.03
		W	...	3 38 0.0	1 40.6	51.55	50.20	.....	83 47 31.20	+ 1.09	- 0.37	+1 7.97	.....
4	February 7, L. Trianguli	W	3	1 48 .....	.....	50.40	49.10	26.317	26 33 54.32	- 0.45	- 0.18	+ 10.63	+29 7 32.99
		E	...	.....	.....	51.40	50.60	26.317	46 8 58.92	+ 0.80	+ 0.18	+ 10.63	.....
5	γ Andromedæ	E	3	1 58 .....	.....	51.50	50.90	27.287	33 23 0.28	+ 2.31	+ 0.19	- 3.19	+41 53 4.48
		W	...	.....	.....	50.70	49.55	27.287	39 18 30.88	+ 1.21	- 0.19	+ 3.19	.....
6	ο Ceti	W	3	2 12 2.0	2 39.0	48.50	49.95	.....	354 3 39.82	+ 0.11	+15.90	- 56.21	- 3 24 9.70
		E	...	2 17 1.0	2 20.0	50.10	51.45	.....	78 41 6.88	+ 1.68	-12.33	+ 56.25	.....
7	ξ ² Ceti	E	3.5	2 21 33.0	1 41.9	50.30	51.65	.....	67 14 43.25	+ 1.89	- 8.50	+ 36.98	+ 8 2 28.90
		W	...	2 24 54.0	1 39.1	49.15	50.50	.....	5 30 6.22	+ 0.69	+ 8.04	- 36.99	.....
8	μ Ceti	W	3	2 37 36.0	2 21.0	48.50	49.80	.....	7 10 37.45	+ 0.01	+17.05	- 34.63	+ 9 43 10.78
		E	...	2 42 9.0	2 12.0	50.35	51.40	.....	65 34 10.30	+ 1.77	-14.94	+ 34.65	.....
9	February 8, L. Trianguli	E	2.5	1 48 .....	.....	49.15	50.65	26.243	46 9 0.98	+ 1.34	+ 0.18	+ 10.41	+29 7 33.37
		W	...	.....	.....	49.45	51.05	26.243	26 33 55.08	+ 1.72	- 0.18	- 10.41	.....
10	γ Andromedæ	W	2.5	1 58 .....	.....	49.50	51.05	27.184	39 18 34.75	+ 0.41	- 0.19	+ 3.12	+41 53 3.95
		E	...	.....	.....	49.35	50.90	27.184	33 23 6.30	+ 0.26	- 0.19	- 3.12	.....
11	ι Cassiopeizæ (brightest)	E	2.5	2 18 24.0	3 1.5	49.10	50.70	.....	8 18 39.95	+ 0.60	+11.61	- 32.26	+66 59 15.92
		W	...	2 23 58.0	2 32.5	49.90	51.70	.....	64 25 52.68	+ 1.55	- 8.20	+ 32.28	.....
12	μ Ceti	E	3	2 37 6.0	2 50.9	49.05	50.80	.....	65 34 21.62	+ 0.62	-25.04	+ 33.88	+ 9 43 10.78
		W	...	2 42 35.0	2 38.1	49.95	51.55	.....	7 10 30.22	+ 1.47	+21.43	- 33.91	.....
13	47 H. Cephei	W	2	2 51 4.0	2 39.6	49.75	51.30	.....	76 29 37.12	+ 1.26	- 3.18	+ 51.17	+79 3 18.04
		E	...	2 56 3.0	2 19.4	48.70	50.50	.....	356 15 12.20	+ 0.30	+ 2.43	- 51.19	.....
14	ι Persei	E	2.5	2 59 46.0	2 37.3	48.70	50.50	.....	26 1 40.55	+ 0.31	+38.17	- 11.10	+49 15 35.04
		W	...	3 4 31.0	2 7.7	49.90	51.60	.....	46 42 57.15	+ 1.48	-25.16	+ 11.10	.....
15	H ¹ . Camelop.	W	3	3 9 4.0	2 46.0	50.15	51.65	.....	62 45 43.38	+ 1.65	-10.98	+ 30.18	+65 18 54.78
		E	...	3 14 27.0	2 37.0	49.00	50.65	.....	9 59 7.95	+ 0.53	+ 9.83	- 30.19	.....
16	ξ Tauri	E	3	3 19 21.0	2 49.0	48.65	50.35	.....	65 53 7.45	+ 0.20	-24.27	+ 34.46	+ 9 24 24.14
		W	...	3 24 50.0	2 40.0	50.35	51.85	.....	6 51 43.55	+ 1.85	+21.76	- 34.47	.....
17	149 H ¹ . Cephei	W	3	3 32 50.0	3 28.6	50.00	51.85	.....	83 47 33.62	+ 1.67	- 1.59	+1 6.25	+86 21 31.63
		E	...	3 38 24.0	2 5.4	48.55	50.20	.....	348 57 15.75	+ 0.07	+ 0.58	-1 6.27	.....
18	ξ Persei	W	2.5	3 53 .....	.....	50.00	51.80	26.626	32 57 28.10	+ 0.91	- 0.24	+ 3.62	+35 31 27.27
		E	...	.....	.....	48.50	50.35	26.626	39 45 0.80	- 0.61	+ 0.24	- 3.62	.....
19	174 G. Eridani	E	3.5	3 59 42.0	2 8.1	48.70	50.20	.....	103 10 7.32	+ 0.13	- 6.69	+2 21.60	-27 54 39.58
		W	...	4 4 19.0	2 28.9	50.10	52.00	.....	329 34 40.60	+ 1.77	+ 9.04	-2 21.66	.....

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
6 3 12	17.7	.....	.....	4. 18. Instrument in meridian, observation at IX with movable thread.	1	36 22 25.79	.....	1	.....	- 9.39
3 22	18.0	.....	.....	5. Instrument in meridian, observation at II with movable thread.	2	20.22	.....	2	.....	.....
3 35	17.6	18.7	30.116	9. Instrument in meridian, observation at I with movable thread.	3	24.60	.....	3	.....	-12.98
7 1 46	25.4	26.9	30.171	10. Instrument in meridian, observation at VIII with movable thread.	4	25.48	.....	4	.....	.....
1 56	24.7	.....	.....	11. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	5	25.64	.....	5	.....	.....
2 15	23.4	.....	.....		6	26.05	.....	6	.....	.....
2 27	22.4	.....	.....		7	25.79	.....	7	.....	.....
2 40	21.7	.....	.....		8	25.83	.....	8	.....	.....
2 55	21.3	23.3	30.147		9	25.22	.....	9	.....	.....
8 1 46	30.9	32.1	29.889		10	24.94	.....	10	.....	.....
1 56	30.3	.....	.....		11	24.62	.....	11	.....	.....
2 21	28.9	.....	.....		12	25.14	.....	12	.....	.....
2 40	27.9	.....	.....		13	25.06	.....	13	.....	.....
2 54	27.0	28.8	29.888		14	26.25	.....	14	.....	- 5.04
3 2	26.7	.....	.....	Notes.	15	26.18	.....	15	.....	- 9.39
3 12	26.4	.....	.....	4. Faint.	16	25.26	.....	16	.....	.....
3 22	26.0	.....	.....	7. Very faint; clouds.	17	25.04	.....	17	.....	-13.11
3 36	25.7	.....	.....		18	25.90	.....	18	.....	.....
3 51	25.2	28.6	29.892		19	26.06	.....	19	.....	+20.11
4 0	25.0	.....	.....				.....		.....	.....
4 4.5	24.8	.....	.....				.....		.....	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.	
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>	
1	α^2 Eridani	W	3	4 8 23.0	2 39.1	49.95	51.55	.....	349 39 52.88	+ 1.50	+14.62	-1 4 74	- 7 48 4 24
		E	...	4 13 39.0	2 36.9	48.50	50.15	.....	83 4 55.62	+ 0.02	-14.21	+1 4 76	
2	δ Tauri	E	3	4 22 30.0	2 23.0	48.90	50.60	.....	59 51 36.15	+ 0.47	-20.99	+ 26.55	+15 26 0.28
		W	...	4 27 30.5	2 37.5	50.40	52.10	.....	12 53 8.40	+ 1.99	+25.46	- 26.55	
3	γ 258 G. Eridani	W	3.5	4 33 27.0	2 50.6	50.00	51.55	.....	332 48 49.15	+ 1.50	+12.53	-2 2 38	-24 40 7.78
		E	...	4 38 56.0	2 38.4	48.60	50.35	.....	99 55 58.00	+ 0.15	-10.80	+2 2 46	
4	κ Tauri	E	3	4 49 43.5	2 47.2	49.05	50.45	.....	50 23 48.08	+ 0.47	-44.41	+ 15.29	+24 54 22.44
		W	...	4 55 15.5	2 44.8	50.60	52.15	.....	22 21 0.90	+ 2.12	+43.14	- 15.30	
5	ϵ 55 Cassiopeiæ S. P.	W	4	14 4 30.0	2 42.1	50.75	51.05	.....	111 17 43.62	+ 2.75	+ 4.68	+3 47.25	+66 5 31.02
		E	...	14 10 28.0	3 15.9	49.00	49.60	.....	321 27 7.05	+ 1.08	- 6.83	-3 47.53	
6	δ Cassiopeiæ S. P. (brightest)	W	3.5	14 18 25.0	3 0.5	50.60	51.05	.....	110 24 11.28	+ 2.63	+ 5.62	+3 33.80	+66 59 16.42
		E	...	14 24 38.0	3 12.5	48.90	49.50	.....	322 20 38.52	+ 0.97	- 6.39	-3 33.49	
7	γ 47 H. Cephei S. P.	E	3.5	14 51 0.0	2 43.5	48.20	49.00	.....	334 23 2.05	+ 0.36	- 2.44	-1 56.32	+79 3 20.60
		W	...	14 56 34.0	2 50.5	51.10	51.65	.....	98 21 46.60	+ 3.23	+ 2.65	+1 56.52	
8	ϵ 1 H ¹ . Camelop. S. P.	W	4.5	15 9 0.0	2 50.0	51.45	52.00	.....	112 4 3.78	+ 3.53	+ 5.28	+4 1.07	+65 18 55.88
		E	...	15 14 30.0	2 40.0	48.45	49.00	.....	320 40 44.15	+ 0.48	- 4.68	-4 1.09	
9	γ 149 H ¹ . Cephei S. P.	E	3	15 31 44.0	4 34.5	48.95	49.50	.....	341 40 46.75	+ 1.00	- 2.49	-1 27.92	+86 21 33.62
	February 9, L.	W	...	15 36 0.0	0 18.5	50.15	50.60	.....	91 4 6.60	+ 2.15	+ 0.01	+1 27.90	
10	β Trianguli	W	2.5	2 4 ....	.....	48.45	50.35	26.556	31 58 58.80	- 0.18	- 0.23	- 4 57	+34 32 52.18
		E	...	.....	.....	49.55	51.25	26.556	40 43 37.22	+ 0.87	+ 0.23	+ 4 57	
11	θ Persei	E	2	2 38 ....	.....	49.80	51.25	26.973	26 26 11.90	+ 2.26	+ 0.25	- 10.46	+48 50 12.70
		W	...	.....	.....	48.90	50.70	26.973	46 15 44.15	+ 1.56	- 0.25	+ 10.46	
12	α 41 Arietis	W	2.5	2 42 15.0	2 17.5	48.35	50.15	.....	24 19 23.78	+ 0.41	+34.29	- 12.78	+26 52 36.76
		E	...	2 46 50.5	2 18.0	49.60	51.15	.....	48 25 25.80	+ 1.57	-34.53	+ 12.78	
13	γ 47 H. Cephei	E	2.5	2 51 8.0	2 35.4	49.20	51.15	.....	356 15 9.68	+ 1.34	+ 3.02	- 50.43	+79 3 18.76
		W	...	2 56 25.0	2 41.6	48.95	50.60	.....	76 29 39.52	+ 0.96	- 3.27	+ 50.47	
14	ζ Eridani	W	3	3 8 40.0	2 35.1	48.50	50.35	.....	348 17 53.40	+ 0.61	+13.54	-1 6.82	- 9 10 7.90
		E	...	3 13 56.0	2 34.9	49.50	51.35	.....	84 26 55.02	+ 1.59	-13.52	+1 6.88	
15	δ Tauri	E	3	3 22 27.0	2 54.7	49.55	51.50	.....	64 16 38.60	+ 1.68	-27.16	+ 31.85	+11 0 56.39
		W	...	3 27 43.0	2 21.3	49.15	51.10	.....	8 28 17.12	+ 1.27	+17.77	- 31.85	
16	δ Eridani	E	3.5	3 36 12.0	2 37.9	49.75	51.65	.....	85 21 40.10	+ 1.90	-13.80	+1 9.12	-10 4 54.54
		W	...	3 41 26.0	2 36.1	49.00	50.95	.....	347 23 9.30	+ 1.14	+13.49	-1 9.14	
17	γ Eridani	W	3.5	3 50 56.0	2 47.9	48.40	50.25	.....	343 41 36.18	+ 0.50	+14.60	-1 18.94	-13 46 36.92
	February 10, L.	E	...	3 56 28.0	2 44.1	49.65	51.60	.....	89 3 12.75	+ 1.80	-13.94	+1 19.01	
18	γ Persei	W	3	2 55 7.0	2 58.3	49.80	52.45	.....	50 36 2.88	+ 2.30	-32.92	+ 14.60	+53 8 39.89
		E	...	3 0 23.5	2 18.2	48.95	51.75	.....	22 8 53.82	+ 1.54	+19.79	- 14.63	
Time.	Ther. 3992.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.								No.	Zenith point.	Red. to 1907 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>										<i>° ' "</i>	<i>"</i>
8 4 11	25.0	10. Instrument in meridian, observation at IX with movable thread.								1	36 22 25.22	...
4 25	24.7	11. Instrument in meridian, observation at II with movable thread.								2	25.74	+ 0.76
4 34	24.6									3	25.30	+18.79
4 19	24.3									4	25.14	+ 3.78
4 53	23.7	27.1	29.904									5	26.04	...
14 5	17.0	18.0	29.872									6	26.47	...
14 11	16.4									7	26.32	...
14 19	18.2									8	26.26	- 0.41
14 25	18.8									9	27.00	-13.16
14 51.5	17.0									10	26.80	...
14 57	16.2	18.6	29.879									11	25.40	...
15 9.5	14.5									12	25.06	...
15 15	14.5									13	25.04	...
15 35	15.1									14	25.15	+14.95
15 43	...	16.2	29.901									15	24.64	+ 8.13
9 2 2	33.7	35.2	29.789									16	26.06	...
2 36	32.7									17	25.98	...
2 54	32.4									18	23.69	...
3 12	30.4	32.4	29.778	Notes. Very faint; poor. 15, 16, 18. Clouds.										
3 25	30.0											
3 42	29.7											
3 54	29.0											
4 5	...	30.9	29.778											
10 2 56	45.6											
3 1	45.0	46.7	29.476											

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	17 Tauri	W	3	3 37 5.5	2 17.8	49.40	52.35	.....	21 16 8.20	+ 2.05	+28.29	- 15.61	+23 49 14.04
		E	...	3 42 27.3	3 4.0	48.15	51.10	.....	51 29 2.30	+ 0.81	-50.42	+ 15.61	
2	γ Eridani	E	3.5	3 51 9.0	2 34.8	48.35	51.30	.....	89 3 16.10	+ 1.03	-12.42	+1 15.72	-13 46 38.07
		W	...	3 56 16.0	2 32.2	50.40	53.05	.....	343 41 31.62	+ 2.98	+12.00	-1 15.75	
3	43 Tauri	W	3	4 1 2.0	2 45.2	49.65	52.30	.....	16 48 38.65	+ 2.17	+32.63	- 20.56	+19 21 44.48
		E	...	4 6 21.5	2 34.3	48.15	51.05	.....	55 56 4.55	+ 0.74	-28.47	+ 20.56	
4	δ Tauri	E	3	4 14 50.5	2 46.2	48.50	51.30	.....	57 58 24.52	+ 1.07	-30.40	+ 22.92	+17 19 23.34
		W	...	4 20 9.5	2 32.8	50.25	52.75	.....	14 46 25.88	+ 2.72	+25.69	- 22.93	
5	ρ Tauri	W	3	4 25 47.5	2 49.2	49.95	52.50	.....	12 5 54.50	+ 2.47	+28.59	- 26.14	+14 38 50.47
		E	...	4 31 1.0	2 24.3	48.30	51.05	.....	60 38 45.72	+ 0.85	-20.80	+ 26.15	
6	258 G. Eridani	E	4	4 34 30.0	1 47.3	48.65	51.50	.....	99 55 57.60	+ 1.23	- 4.96	+1 56.20	-24 40 8.32
		W	...	4 39 29.0	3 11.7	50.25	52.95	.....	332 48 37.62	+ 2.82	+15.82	-1 56.28	
7	k Tauri	W	3	4 49 40.0	2 50.5	50.00	52.55	.....	22 20 58.82	+ 2.50	+46.18	- 14.52	+24 54 22.96
		E	...	4 55 6.5	2 36.0	48.60	51.50	.....	50 23 43.38	+ 1.26	-38.67	+ 14.53	
8	ε Leporis	E	3.5	4 59 7.0	2 27.2	49.05	51.55	.....	97 46 4.30	+ 1.46	- 9.67	+1 46.34	-22 30 0.66
		W	...	5 4 2.0	2 27.8	50.50	52.95	.....	334 58 41.30	+ 2.95	+ 9.75	-1 46.34	
9	12 G. Columbæ	W	3.5	5 12 44.0	3 0.1	49.80	52.25	.....	330 0 58.25	+ 2.24	+13.33	-2 12.25	-27 28 8.12
		E	...	5 18 41.0	2 56.9	48.50	51.30	.....	102 43 50.75	+ 1.12	-12.86	+2 12.25	
10	θ ¹ Orionis	E	3	5 28 5.0	2 40.3	48.65	51.20	.....	80 44 14.75	+ 1.09	-15.51	+ 56.91	- 5 27 14.58
		W	...	5 33 6.0	2 20.7	50.70	53.40	.....	352 0 36.35	+ 3.27	+11.96	- 56.95	
11	ο Aurigæ	W	3	5 36 31.0	2 13.7	50.50	53.00	.....	47 14 34.00	+ 2.97	-25.98	+ 11.19	+49 47 12.98
	February 11, L.	E	...	5 41 7.0	2 22.3	48.10	50.90	.....	25 30 10.78	+ 0.65	+29.42	- 11.20	
12	β Trianguli	E	2	2 4 ....	.....	49.95	52.00	26.600	40 43 33.22	+ 2.35	+ 0.23	+ 4.57	+34 32 51.65
		W	...	.....	.....	49.55	51.55	26.600	31 58 53.15	+ 1.88	- 0.23	- 4.57	
13	θ Persei	W	2	2 38 ....	.....	48.65	50.70	27.024	46 15 44.02	- 0.43	- 0.38	+ 10.49	+48 50 12.86
		E	...	.....	.....	49.80	51.95	27.024	26 26 10.80	+ 0.74	+ 0.38	- 10.49	
14	41 Arietis	E	2.5	2 41 52.5	2 39.8	50.25	52.25	.....	48 25 36.00	+ 1.90	-46.30	+ 12.83	+26 52 37.06
		W	...	2 47 6.3	2 34.0	49.50	51.40	.....	24 19 13.88	+ 1.07	+43.00	- 12.84	
15	γ Persei	E	2	2 55 2.0	3 3.2	49.65	51.65	.....	22 8 40.72	+ 1.26	+34.76	- 15.25	+53 8 40.08
		W	...	3 0 50.0	2 44.8	49.25	51.15	.....	50 36 0.32	+ 0.76	-28.13	+ 15.25	
16	ζ Eridani	E	2.5	3 8 55.0	2 25.9	50.10	52.05	.....	84 26 52.68	+ 1.69	-11.98	+1 6.91	- 9 10 7.64
		W	3.5	3 13 44.0	2 23.1	49.20	51.05	.....	348 17 55.20	+ 0.76	+11.52	-1 6.91	
17	f Tauri	W	3	3 22 54.5	2 51.8	48.55	50.50	.....	10 4 10.25	+ 0.09	+27.58	- 29.74	+12 36 59.03
		E	...	3 29 17.0	3 30.7	50.00	51.95	.....	62 40 53.68	+ 1.59	-41.47	+ 29.76	
18	17 Tauri	E	3	3 36 33.0	2 50.2	50.30	52.15	.....	51 28 52.08	+ 1.85	-43.14	+ 16.27	+23 49 14.56
		W	...	3 42 3.0	2 39.8	49.30	51.15	.....	21 16 0.10	+ 0.87	+38.04	- 16.28	
19	ξ Persei	E	3	3 53 ....	.....	49.95	51.95	26.569	39 44 59.08	+ 2.31	+ 0.24	+ 3.58	+35 31 27.53
		W	...	.....	.....	49.00	50.95	26.569	32 57 29.32	+ 1.33	- 0.24	- 3.58	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
10 3 23	44.2	.....	.....	12 19. Instrument in meridian, observation at I with movable thread.				1	36 22 25.62	.....
3 43	44.3	.....	.....	13. Instrument in meridian, observation at IX with movable thread.				2	25.64	.....
3 54	44.2	45.8	29.492					3	25.14	.....
4 4	44.0	.....	.....					4	24.74	.....
4 18	43.9	.....	.....					5	25.67	+ 7.03
4 29	43.2	.....	.....					6	25.02	+18.90
4 35	42.7	.....	.....					7	26.74	+ 3.71
4 40	42.5	.....	.....					8	25.04	.....
4 52	42.1	43.4	29.524					9	26.42	+18.62
5 0	41.6	.....	.....					10	25.94	+12.93
5 5	41.7	.....	.....					11	25.92	.....
5 13	41.5	.....	.....					12	25.54	.....
5 19	41.6	.....	.....					13	25.12	.....
5 27	41.5	.....	.....					14	24.77	.....
5 42	40.9	42.1	29.541					15	24.84	.....
5 42	31.0	32.3	29.648					16	24.94	+14.93
2 36	29.4	.....	.....					17	25.87	.....
2 45	28.7	.....	.....					18	24.90	.....
2 58	28.4	29.9	29.666					19	24.99	.....
3 12	28.4	.....	.....					
3 26	28.2	.....	.....					
3 40	27.9	.....	.....					
3 51	27.1	28.7	29.694							

Notes.
1, 4, 16, 17. Clouds.
5, 6, 12. High wind.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	43 Tauri	E W	3 ...	4 1 11.0 4 6 22.5	2 36.1 2 35.4	50.15 49.05	52.15 50.90	..... .....	55 56 2.52 16 48 44.52	+ 1.74 + 0.57	-29.13 +28.88	+ 21.47 - 21.48	+19 21 44.66
2	212 G. Eridani	W E	3 ...	4 13 47.0 4 19 23.0	2 50.9 2 45.1	48.75 50.30	50.50 52.25	..... .....	336 36 40.22 96 8 6.48	+ 0.21 + 1.87	+13.41 -12.51	-1 43.38 +1 43.46	-20 51 57.70
3	ρ Tauri	E W	2.5 ...	4 26 4.5 4 31 1.5	2 32.1 2 24.9	50.60 49.05	52.25 50.80	..... .....	60 38 44.80 12 6 4.70	+ 2.05 + 0.48	-23.10 +20.97	+ 27.29 - 27.29	+14 38 50.63
4	τ Tauri	W E	2.5 ...	4 34 4.0 4 39 6.5	2 38.2 2 24.3	48.70 50.25	50.45 52.20	..... .....	20 13 31.70 52 31 12.08	+ 0.10 + 1.87	+35.22 -29.30	- 17.53 + 17.53	+22 46 40.42
5	π^1 Orionis	E W	2.5 ...	4 47 9.0 4 52 23.0	2 40.1 2 33.9	50.55 49.60	52.20 51.20	..... .....	65 17 23.82 7 27 22.75	+ 2.03 + 1.03	-22.15 +20.46	+ 33.44 - 33.45	+10 0 3.54
6	February 12, L. τ Persei	E W	3 ...	2 44 57.0 2 50 16.0	2 44.2 2 34.8	49.25 49.60	50.20 50.85	..... .....	22 54 24.08 49 50 21.88	+ 0.22 + 0.73	+29.98 -26.65	- 14.76 + 14.78	+52 23 2.32
7	ρ Persei	W E	3 ...	2 59 ..... .....	..... .....	49.60 49.45	50.75 50.60	27.192 27.192	35 54 26.12 36 47 15.85	- 0.05 - 0.17	- 0.27 + 0.27	- 0.48 + 0.48	+38 28 51.15
8	12 Eridani	E W	3.5 ...	3 5 26.0 3 10 46.0	2 43.0 2 37.0	49.50 50.15	50.75 51.05	..... .....	104 36 48.82 328 8 0.88	+ 0.64 + 1.18	-10.58 + 9.81	+2 34.01 -2 34.04	-29 21 30.82
9	α Persei	W E	2.5 ...	3 15 5.5 3 20 8.0	2 37.1 2 25.4	50.15 49.15	51.00 50.45	..... .....	46 59 27.28 25 45 25.98	+ 1.14 + 0.34	-36.91 +31.61	+ 11.61 - 11.61	+49 31 55.11
10	f Tauri	E W	3 ...	3 24 11.0 3 27 50.0	1 35.2 2 3.8	49.50 49.90	50.45 50.80	..... .....	62 40 19.72 10 4 23.52	+ 0.47 + 0.86	- 8.47 +14.32	+ 30.61 - 30.62	+12 36 59.59
11	February 13, L. τ Persei	W E	2.5 ...	2 45 5.5 2 50 6.0	2 35.6 2 24.9	48.00 50.00	50.05 52.20	..... .....	49 50 23.55 22 54 28.38	+ 0.53 + 2.66	-26.93 +23.35	+ 14.20 - 14.20	+52 23 2.29
12	ρ Persei	E W	2.5 ...	2 59 ..... .....	..... .....	50.00 48.20	52.20 50.25	27.110 27.110	36 47 15.88 35 54 28.58	+ 0.17 + 1.32	+ 0.17 - 0.17	+ 0.45 - 0.45	+38 28 51.47
13	12 Eridani	W E	3.5 ...	3 5 25.0 3 10 29.0	2 43.9 2 20.1	47.95 50.10	49.85 52.20	..... .....	328 7 53.35 104 36 51.32	+ 0.46 + 2.73	+10.70 - 7.81	-2 27.65 +2 27.64	-29 21 31.80
14	τ^1 Arietis	E W	2.5 ...	3 13 43.5 3 18 8.5	2 9.6 2 15.4	50.20 48.15	52.35 50.15	..... .....	54 29 0.80 18 15 44.02	+ 2.86 + 0.71	-21.43 +23.39	+ 19.41 - 19.41	+20 48 40.25
15	δ Tauri	W E	3 ...	3 22 32.0 3 27 52.0	2 49.2 2 30.8	47.95 50.25	49.95 52.35	..... .....	8 28 9.88 64 16 31.52	+ 0.45 + 2.86	+25.48 -20.24	- 31.41 + 31.41	+11 0 56.13
16	13 H ¹ . Camelop.	E W	3 ...	3 34 34.0 3 38 32.0	2 40.6 1 17.4	50.25 48.20	52.25 50.10	..... .....	8 23 14.32 64 21 25.88	+ 2.85 + 0.70	+ 9.14 - 2.12	- 31.54 + 31.55	+66 54 47.33
17	τ^1 Eridani	W E	3 ...	3 41 43.0 3 46 15.0	1 58.6 2 33.4	48.25 50.20	50.15 52.10	..... .....	333 18 54.72 99 25 55.92	+ 0.73 + 2.69	+ 6.11 -10.22	-1 56.39 +1 56.43	-24 10 3.11
18	λ Persei	E W	2.5 ...	3 57 5.5 4 2 6.0	2 36.7 2 24.8	50.00 48.50	52.10 50.40	..... .....	25 11 14.48 47 33 28.80	+ 2.63 + 1.01	+34.46 -29.43	- 11.75 + 11.75	+50 6 2.87
19	151 H ¹ . Cephei	W E	3 ...	4 5 40.0 4 9 44.0	1 31.5 2 32.5	48.40 49.00	50.35 52.00	..... .....	82 44 54.18 349 59 52.88	+ 0.91 + 2.56	- 0.40 + 1.11	+1 2.30 -1 2.32	+85 18 48.09

Time	Ther- m.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in</i>						<i>° ' "</i>	<i>"</i>
11 4 4	26.7			Instrument in meridian, observation at IX with movable thread.				1	16 22 24.54	.....
4 14	26.7			Instrument in meridian, observation at II with movable thread.				2	24.88	+18.23
4 25	26.1							3	24.95	+ 7.00
4 29	26.6							4	25.88	.....
4 37	26.8							5	25.96	+ 8.69
4 38	25.9	27.5	29.710					6	25.14	.....
4 48	25.7							7	25.78	.....
2 48	25.9							8	25.66	.....
2 51	25.9							9	24.72	.....
3 6	25.1							10	25.20	.....
3 11	25.1							11	25.78	.....
3 18	25.1							12	25.60	.....
3 19	19.7							13	25.17	.....
3 40	19.7							14	25.18	.....
3 48	19.7							15	24.97	+ 8.16
3 57	19.7							16	25.09	+ 9.82
4 1	19.7							17	25.09	+19.14
4 25	19.6							18	25.09	+ 6.68
4 35	19.6							19	25.09	.....
4 48	19.6									
4 5	19.6									

Note.
Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	212 G. Eridani	E W	3 ...	4 13 54.0 4 19 6.0	2 43.6 2 28.4	49.75 48.50	52.00 50.55	..... .....	96 8 7.05 336 36 41.48	+ 2.41 + 1.05	-12.28 +10.11	+1 41.72 -1 41.73	-20 51 57.29
2	80 Tauri	W E	2.5 ...	4 23 16.5 4 27 31.5	1 36.0 2 39.0	48.35 50.00	50.25 52.15	..... .....	12 53 25.50 59 51 40.65	+ 0.86 + 2.68	+ 9.46 -25.94	- 25.83 + 25.85	+15 26 0.00
3	τ Tauri	E W	3 ...	4 33 48.5 4 39 20.0	2 53.4 2 38.1	49.95 48.40	51.85 50.40	..... .....	52 31 24.52 20 13 30.70	+ 2.40 + 0.96	-42.30 +35.18	+ 17.24 - 17.24	+22 46 40.53
4	π ¹ Orionis	W E	3 ...	4 46 48.0 4 52 20.0	3 0.8 2 31.2	48.10 50.10	49.95 52.20	..... .....	7 27 16.80 65 17 22.20	+ 0.57 + 2.75	+28.24 -19.75	- 32.80 + 32.80	+10 0 4.03
5	ε Leporis	W E	3.5 ...	4 58 49.0 5 4 20.0	2 44.9 2 46.1	48.20 50.00	50.40 52.10	..... .....	334 58 44.32 97 46 3.62	+ 0.83 + 2.58	+12.14 -12.32	-1 48.88 +1 48.91	-22 30 0.48
6	12 G. Columbæ	E W	3.5 ...	5 12 50.0 5 18 46.0	2 53.8 3 2.2	49.95 48.75	52.15 50.95	..... .....	102 43 45.45 330 1 0.72	+ 2.65 + 1.40	-12.41 +13.64	+2 15.39 -2 15.47	-27 28 8.69
7	θ ¹ Orionis	W E	...	5 28 4.0 5 33 5.0	2 40.9 2 20.1	48.30 50.00	48.95 50.65	..... .....	352 0 36.42 80 44 8.35	+ 0.90 + 2.62	+15.63 -11.86	- 58.30 + 58.32	- 5 27 14.68
8	ο Aurigæ	E W	2.5 ...	5 36 15.0 5 40 46.5	2 29.4 2 2.1	49.95 48.95	50.35 49.50	..... .....	25 30 5.90 47 14 32.40	+ 2.48 + 1.50	+32.42 -21.67	- 11.46 + 11.46	+49 47 13.89
9	47 H. Cephei s. p.	W E	3 ...	14 51 20.0 14 56 40.0	2 22.5 2 57.5	48.60 49.55	47.95 49.40	..... .....	98 21 56.42 334 22 54.15	+ 0.16 + 1.42	+ 1.85 - 2.87	+1 49.97 -1 49.85	+79 3 20.51
10	149 H ¹ . Cephei s. p.	W E	3.5 ...	15 31 36.0 15 36 36.0	4 40.3 0 19.7	48.30 49.75	48.35 49.80	..... .....	91 4 4.38 341 40 30.40	+ 0.20 + 1.71	+ 2.59 - 0.01	+1 22.49 -1 22.47	+86 21 33.27
11	5 H. Camelop. s. p. February 14, L.	E W	4 ...	15 40 56.0 15 45 16.0	0 22.3 4 42.3	49.70 48.50	50.40 49.15	..... .....	326 23 13.20 106 21 11.80	+ 2.00 + 0.76	- 0.07 +11.67	-2 39.21 +2 39.03	+71 2 59.62
12	β Persei	E W	3.5 ...	3 2 .... ....	.... ....	49.70 49.50	51.95 51.40	26.810 26.810	34 40 27.62 38 1 40.75	+ 2.12 + 1.78	+ 0.29 - 0.29	- 1.71 + 1.71	+40 35 54.53
13	α ¹ Arietis	W E	3 ...	3 13 8.5 3 18 23.5	2 44.5 2 30.5	48.85 49.55	51.00 51.60	..... .....	18 15 25.88 54 29 4.08	+ 0.50 + 1.15	+34.53 -28.90	- 19.08 + 19.09	+20 48 39.91
14	ε Eridani	E W	3 ...	3 26 5.0 3 31 3.0	2 29.6 2 28.4	49.90 49.55	51.70 51.50	..... .....	85 3 16.05 347 41 19.50	+ 1.40 + 1.12	-12.46 +12.26	+1 6.33 -1 6.36	- 9 46 35.69
15	13 H ¹ . Camelop.	W E	3 ...	3 34 53.0 3 39 50.0	2 21.4 2 35.6	49.50 49.55	51.45 51.55	..... .....	64 21 23.52 8 23 9.70	+ 1.06 + 1.14	- 7.09 + 8.58	+ 31.05 - 31.06	+66 54 46.80
16	λ Persei	W E	3 ...	3 57 7.5 4 1 48.5	2 33.6 2 7.4	49.55 49.70	51.35 51.80	..... .....	47 33 24.90 25 11 19.92	+ 1.04 + 1.34	-33.11 +22.78	+ 11.59 - 11.60	+50 6 2.70
17	151 H ¹ . Cephei	E W	3.5 ...	4 5 44.0 4 9 50.0	1 27.1 2 38.9	49.90 49.85	52.05 51.90	..... .....	349 59 47.40 82 44 47.78	+ 1.59 + 1.46	+ 0.36 - 1.21	-1 1.53 +1 1.56	+85 18 47.59
18	ε Tauri	W E	3 ...	4 20 17.5 4 25 50.5	2 55.6 2 37.4	49.55 49.85	51.45 51.80	..... .....	16 25 11.10 56 19 17.58	+ 1.08 + 1.42	+36.26 -29.13	- 21.33 + 21.35	+18 58 24.65
19	70 B. Ursæ Minoris s. p.	E W	3 ...	4 32 0.0 4 37 20.0	2 38.2 2 41.8	49.50 50.00	51.40 52.20	..... .....	332 57 14.88 99 47 17.45	+ 1.03 + 1.70	- 2.54 + 2.66	-1 57.12 +1 57.17	+77 37 41.93

Time.		Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d</i>	<i>h m</i>	°	°	in.			° ' "	"
13	4 14	36.3	....	....	10. 11. Instrument in meridian, observation between fixed thread and movable at 25.150 rev.	1	36 22 24.90	+18.28
	4 24	36.2	....	....	12. Instrument in meridian, observation at I with movable thread.	2	26.62	+ 6.71
	4 37	35.7	....	....		3	25.78	....
	4 50	35.4	....	....		4	25.40	+ 8.56
	4 57	....	36.9	29.822		5	25.60	....
	4 59	35.2	....	....		6	25.68	+18.83
	5 5	35.0	....	....		7	26.04	+13.03
	5 13	35.0	....	....		8	26.52	....
	5 19	34.7	....	....		9	25.62	....
	5 31	34.4	....	....		10	25.16	-13.53
	5 40	34.3	35.8	29.808		11	25.10	....
	14 52	37.0	35.8	29.486		12	19.44	....
	14 57	37.5	....	....		13	18.62	....
	15 35	38.3	....	....		14	18.92	....
	15 41	38.7	....	....		15	18.45	- 9.82
	15 46	39.1	39.8	29.476	2 W., 8 E. One microscope reading decreased 10".	16	18.43	- 5.09
	3 3	42.3	43.7	29.582	9. 13. Very faint.	17	18.70	....
	3 24	41.3	....	....	17. High wind.	18	19.16	....
	3 29	41.1	....	....		19	17.62	+14.36
	3 37	40.9	....	....		
	4 0	39.5	....	....		
	4 8	38.8	40.2	29.619				
	4 23	38.7	....	....		

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	π^3 Orionis	W E	3	4 46 36.5 4 52 3.5	2 50.1 2 30.9	49.95 49.95	51.80 51.95	.....	359 44 34.92 73 0 0.48	+ 1.46 + 1.51	+20.56 -17.50	- 43.79 + 43.81	+ 2 17 9.13
2	β Eridani	E W	3	5 0 32.0 5 5 54.0	2 46.9 2 35.1	50.15 50.60	52.00 52.50	.....	80 29 27.72 352 15 8.40	+ 1.68 + 2.15	-16.90 +14.60	+ 57.16 - 57.20	- 5 12 34.15
3	λ Leporis	W E	3	5 12 39.0 5 17 54.0	2 40.8 2 34.2	50.20 50.05	52.00 51.75	.....	344 11 27.90 88 33 6.08	+ 1.70 + 1.49	+13.51 -12.43	-1 16.02 +1 16.05	-13 16 35.79
4	β Leporis	E W	3-5	5 21 20.0 5 26 40.0	2 40.1 2 30.0	50.00 50.45	51.85 52.35	.....	96 6 19.70 336 38 13.30	+ 1.49 + 1.98	-13.13 +10.40	+1 41.04 -1 41.12	-20 50 15.53
5	23 Camelop.	W E	3-5	5 33 21.0 5 37 47.0	2 17.0 2 9.0	50.40 50.15	52.40 52.00	.....	58 52 44.12 13 51 52.65	+ 1.99 + 1.69	- 9.05 + 8.82	+ 24.56 - 24.59	+61 25 57.79
6	δ Leporis	E W	3-5	5 44 41.0 5 50 4.0	2 40.9 2 42.1	50.05 51.00	51.90 52.90	.....	96 9 29.50 336 35 3.05	+ 1.58 + 2.56	-11.88 +12.05	+1 41.70 -1 41.77	-20 53 25.79
7	66 Orionis	W E	3	5 57 17.0 6 2 41.0	2 49.0 2 35.0	50.75 49.70	52.40 51.50	.....	1 37 2.92 71 7 28.90	+ 2.18 + 1.20	+21.20 -17.83	- 41.26 + 41.28	+ 4 9 42.45
8	February 15, L. β Persei	W E	2-5	3 2 ..... .....	..... .....	49.30 51.30	51.00 53.00	26.774 26.774	38 1 43.05 34 40 29.38	+ 0.15 + 2.18	- 0.29 + 0.29	+ 1.74 - 1.74	+40 35 53.98
9	α Persei	E W	2-5	3 15 5.0 3 20 10.0	2 37.2 2 28.1	51.15 49.60	53.00 50.95	.....	25 45 11.80 46 59 18.22	+ 2.85 + 1.01	+36.94 -32.79	- 11.14 + 11.14	+49 31 55.27
10	ϵ Eridani	W E	3	3 25 44.0 3 31 17.5	2 50.5 2 43.0	49.65 51.55	50.85 53.15	.....	347 41 18.45 85 3 16.12	+ 0.98 + 3.13	+16.18 -14.79	-1 7.50 +1 7.66	- 9 46 35.34
11	5 H. Camelop.	E W	3	3 37 47.0 3 43 12.0	2 46.4 2 38.6	51.50 49.45	53.15 50.90	.....	4 15 6.50 68 29 27.55	+ 3.11 + 0.91	+ 7.17 - 6.52	- 37.41 + 37.45	+71 2 56.72
12	ρ Tauri	W E	3	4 4 12.0 4 7 36.3	0 59.7 2 24.6	48.85 51.70	50.60 53.35	.....	23 41 27.22 49 3 38.62	+ 0.44 + 3.32	+ 6.19 -36.24	- 13.43 + 13.44	+26 14 17.35
13	ν^4 Eridani	E W	3-5	4 12 38.0 4 17 8.0	1 46.3 2 43.7	51.40 49.50	53.20 51.05	.....	109 16 15.60 323 28 14.15	+ 3.05 + 0.99	- 4.16 + 9.86	+3 11.76 -3 11.82	-34 1 49.83
14	70 B. Ursæ Minoris s. p.	W E	2-5	4 31 54.0 4 37 20.0	2 44.3 2 41.7	50.55 50.75	52.05 52.30	.....	99 47 16.75 332 57 16.50	+ 2.05 + 2.28	+ 2.74 - 2.66	+1 58.85 -1 58.94	+77 37 41.69
15	π^3 Orionis	E W	3	4 46 38.0 4 52 2.0	2 48.4 2 35.6	50.65 50.30	52.20 51.80	.....	73 0 1.25 359 44 38.68	+ 2.15 + 1.79	-20.15 +17.20	+ 44.43 - 44.42	+ 2 17 9.49
16	β Eridani	W E	3	5 0 26.5 5 6 1.5	2 52.3 2 42.7	50.20 50.80	51.80 52.55	.....	352 15 7.30 80 29 26.50	+ 1.75 + 2.44	+18.02 -16.07	- 57.85 + 57.85	- 5 12 34.04
17	λ Leporis	E W	3	5 12 44.0 5 17 45.0	2 35.7 2 25.3	50.75 50.35	52.50 52.00	.....	88 33 3.95 344 11 32.08	+ 2.38 + 1.94	-12.67 +11.04	+1 16.88 -1 16.90	-13 16 34.48
18	β Leporis	W E	3-5	5 21 30.0 5 27 6.0	2 48.0 2 48.0	50.20 50.60	51.80 51.90	.....	336 38 13.38 96 6 20.20	+ 1.73 + 1.99	+12.96 -12.96	-1 42.14 +1 42.13	-20 50 16.01

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
14 4 33	37.9	.....	.....	8. Instrument in meridian, observation at IX with movable thread.	1	36 22 20.72	.....
4 38	37.8	.....	.....		2	18.80	.....
4 40	37.5	.....	.....		3	19.59	+15.47
5 1	37.0	38.7	29.645		4	16.86	.....
5 15	36.3	.....	.....		5	19.04	- 6.59
5 22	36.1	.....	.....		6	18.40	+16.61
5 27	35.8	.....	.....		7	19.30	+10.05
5 35	34.8	.....	.....		8	19.21	.....
5 45	34.2	.....	.....		9	19.01	.....
5 51	33.8	.....	.....		10	20.07	.....
6 1	33.5	34.8	29.679		11	19.38	.....
15 1 2	37.2	39.3	29.818		12	19.78	+ 2.91
1 15	36.4	.....	.....		13	19.72	.....
1 25	36.5	.....	.....		14	18.78	+14.48
3 44	34.1	.....	.....		15	20.46	.....
4 8	34.0	35.9	29.796		16	19.97	.....
4 13	34.2	.....	.....		17	19.15	+15.55
4 18	34.0	.....	.....		18	18.64	.....
4 33	33.6	.....	.....	Notes.			
4 38	33.2	.....	.....	Clouds.			
4 40	33.0	.....	.....	High wind.			
5 1	33.7	34.9	29.784				
5 15	32.0	.....	.....		
5 25	31.0	.....	.....		
5 28	31.0	.....	.....		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	23 Camelop.	E W	2.5 ...	5 32 41.0 5 38 16.0	2 56.9 2 38.1	50.60 50.40	52.45 52.20	..... .....	13 51 43.75 58 52 48.58	+ 2.29 + 2.04	+16.59 -13.24	- 24.77 + 24.78	+61 25 58.86
2	δ Leporis	W E	3.5 ...	5 44 37.0 5 50 5.0	2 44.8 2 43.2	50.35 50.70	52.20 52.45	..... .....	336 35 2.50 96 9 29.52	+ 2.03 + 2.34	+12.46 -12.22	-1 42.38 +1 42.41	-20 53 27.01
3	66 Orionis	E W	2.5 ...	5 57 23.0 6 2 44.0	2 42.9 2 38.1	50.55 50.45	52.35 52.30	..... .....	71 7 29.62 1 37 5.78	+ 2.22 + 2.13	-19.70 +18.56	+ 41.47 - 41.47	+ 4 9 42.41
4	2 Lyncis	W E	... ...	6 8 33.0 6 14 14.0	2 55.1 2 45.9	50.45 50.40	52.30 52.15	..... .....	56 29 44.92 16 14 50.10	+ 2.15 + 2.02	-19.44 +17.46	+ 21.92 - 21.93	+59 2 47.66
5	1 H ¹ . Camelop. s. p.	E W	4.5 ...	15 9 10.0 15 14 36.0	2 38.9 2 47.1	50.15 50.80	51.35 51.90	..... .....	320 40 28.35 112 4 7.02	+ 0.24 + 0.84	- 4.62 + 5.10	-3 52.83 +3 52.93	+65 18 55.92
6	13 H ¹ . Camelop. s. p.	W E	4 ...	15 34 42.0 15 40 0.0	2 32.3 2 45.7	50.90 50.55	51.80 51.55	..... .....	110 28 39.35 322 15 57.70	+ 0.86 + 0.59	+ 4.01 - 4.75	+3 29.51 -3 29.52	+66 54 48.44
7	151 H ¹ . Cephei s. p.	E W	3.5 ...	16 4 30.0 16 9 30.0	2 40.6 2 19.4	50.10 51.00	51.30 52.00	..... .....	340 37 53.68 92 6 40.58	+ 0.23 + 1.02	- 1.08 + 0.81	-1 28.53 +1 28.53	+85 18 49.98
8	τ ⁶ Eridani February 16, L.	W E	3.5 ...	3 40 10.0 3 45 25.0	2 42.4 2 32.6	49.65 50.35	51.95 52.95	..... .....	333 56 53.05 98 47 37.25	+ 0.11 + 1.00	+11.58 -10.22	-1 49.70 +1 49.91	-23 31 44.75
9	f Tauri February 18, L.	W E	2.5 ...	3 23 3.5 3 28 19.5	2 42.0 2 34.0	51.25 49.70	53.00 51.20	..... .....	10 4 4.00 62 40 29.30	+ 1.92 + 0.22	+24.53 -22.16	- 29.42 + 29.42	+12 36 58.82
10	τ ⁶ Eridani	E W	3 ...	3 40 9.0 3 45 35.0	2 43.1 2 42.9	49.75 51.55	51.10 53.15	..... .....	98 47 36.72 333 56 54.18	+ 0.24 + 2.19	-11.67 +11.65	+1 53.68 -1 53.74	-23 31 45.64
11	ψ Tauri	W E	2.5 ...	3 59 16.5 4 3 23.0	2 0.3 2 6.2	50.35 50.90	51.75 52.55	..... .....	26 11 41.88 46 32 58.08	+ 0.89 + 1.55	+30.49 -33.55	- 10.72 + 10.73	+28 44 59.56
12	μ Tauri	E W	3 ...	4 8 52.0 4 12 31.0	1 38.5 2 0.5	51.05 50.80	52.60 52.05	..... .....	66 37 38.62 6 6 48.55	+ 1.68 + 1.23	- 8.07 +12.09	+ 34.83 - 34.83	+ 8 39 26.69
13	ε Tauri	E W	3 ...	4 20 23.0 4 25 52.5	2 49.6 2 39.9	51.00 50.40	52.65 51.70	..... .....	56 19 21.10 16 25 15.90	+ 1.66 + 0.87	-33.83 +30.07	+ 21.69 - 21.69	+18 58 23.96
14	35 B. Camelop.	W E	3.5 ...	4 33 31.0 4 38 56.0	2 49.4 2 35.6	50.15 51.10	51.75 52.55	..... .....	73 12 55.85 359 31 40.48	+ 0.76 + 1.69	- 4.99 + 4.21	+ 44.76 - 44.76	+75 46 34.08
15	ι Aurigæ	E W	2.5 ...	4 51 ..... .....	..... .....	51.05 50.40	52.55 52.15	27.655 27.655	42 14 30.08 30 26 28.30	+ 2.34 + 1.80	+ 0.22 - 0.22	+ 6.18 - 6.18	+33 1 9.14
16	ο Orionis	W E	3 ...	5 14 13.0 5 19 40.0	2 49.7 2 37.3	50.10 51.35	51.95 52.95	..... .....	356 58 54.75 75 45 38.65	+ 0.84 + 2.00	+10.26 -16.54	- 49.15 + 49.17	- 0 28 37.09
17	σ Orionis	E W	2.5 ...	5 31 23.0 5 36 44.0	2 43.6 2 37.4	51.25 50.65	52.85 52.05	..... .....	77 56 18.78 354 48 14.28	+ 1.85 + 1.14	-17.10 +15.82	+ 53.15 - 53.17	- 2 39 22.00
18	ξ Aurigæ	W E	2.5 ...	5 44 9.0 5 49 37.0	2 56.4 2 31.6	50.65 50.90	52.40 52.50	..... .....	53 8 20.80 19 36 16.52	+ 1.31 + 1.49	-25.80 +10.05	+ 18.09 - 18.10	+55 41 14.42

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907°
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
15 5 36	32.9	.....	.....	15. Instrument in meridian, observation at I with movable thread.	1	36 22 20.01	- 6.70
5 47	32.8	.....	.....		2	18.33	+10.73
5 51	32.6	.....	.....		3	19.30	+10.09
6 0	32.8	.....	.....		4	18.50	- 5.10
6 12	32.6	34.0	29.771		5	18.52	- 9.15
15 10	27.2	.....	.....		6	18.88	- 9.78
15 15	27.0	28.4	29.676		7	17.62	.....
15 35	26.3	.....	.....		8	16.49	.....
15 41	26.3	.....	.....		9	18.90	.....
16 10	26.3	27.7	29.672		10	16.62	.....
16 3 41	48.5	50.2	29.614		11	19.68	+ 2.10
3 46	47.6	.....	.....		12	17.05	+ 9.29
18 3 24	34.7	.....	.....		13	17.88	.....
3 29	34.6	30.4	29.756		14	19.00	.....
3 41	33.9	.....	.....		15	19.06	.....
3 46	33.7	.....	.....		16	19.49	.....
4 1	33.1	.....	.....		17	17.38	+12.63
4 11	33.0	.....	.....	Notes.	18	16.68	.....
4 23	32.7	.....	.....	16. Faint and poor; clouds.			
4 36	32.7	.....	.....	17 E. One microscope reading decreased 10".			
4 49	32.7	34.7	29.756				
5 17	31.6	.....	.....		
5 34	30.7	.....	.....		
5 47	30.3	32.2	29.741				

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	1 Geminorum	E	3	5 55 47.0	2 43.1	51.05	52.45	.....	52 1 51.32	+ 1.61	- 38.42	+ 16.85	+23 16 3.73
		W	...	6 1 11.5	2 41.4	50.95	52.45	.....	20 42 43.15	+ 1.51	+ 37.62	- 16.86	
2	2 Lyncis	E	3	6 8 27.0	3 0.7	51.40	52.65	.....	16 14 46.28	+ 1.85	+ 20.70	- 22.03	+59 2 48.08
		W	...	6 14 7.0	2 39.3	51.35	52.55	.....	56 29 41.82	+ 1.81	- 16.10	+ 22.03	
3	6 Lyncis	W	3	6 10 49.0	2 56.2	51.35	52.60	.....	55 40 58.48	+ 1.81	- 20.98	+ 21.07	+58 13 58.24
		E	...	6 25 24.0	2 38.8	51.20	52.55	.....	17 3 39.62	+ 1.72	+ 17.04	- 21.07	
4	7 Geminorum	E	3	6 29 36.0	2 46.6	51.15	52.55	.....	58 48 57.60	+ 1.68	- 20.58	+ 24.84	+16 28 40.08
		W	...	6 35 2.0	2 39.4	51.25	52.55	.....	13 55 37.32	+ 1.75	+ 27.08	- 24.85	
5	18 Monocerotis	W	3	6 40 2.5	3 0.4	51.25	52.55	.....	359 58 4.80	+ 1.60	+ 23.25	- 44.33	+ 2 30 42.51
	February 21, L.	E	...	6 45 49.0	2 46.1	51.25	52.75	.....	72 46 27.35	+ 1.81	- 19.70	+ 44.33	
6	7 Tauri	W	3	4 11 41.0	2 50.0	51.20	52.95	.....	12 51 3.15	+ 0.93	+ 29.62	- 26.24	+15 24 5.44
		E	...	4 17 11.0	2 40.0	50.70	52.25	.....	59 53 29.62	+ 0.35	- 26.24	+ 26.25	
7	α Tauri	E	3	4 27 47.0	2 49.1	50.55	52.30	.....	58 58 23.02	+ 0.22	- 30.30	+ 25.13	+16 19 15.45
		W	...	4 33 16.5	2 40.4	51.80	53.20	.....	13 46 12.15	+ 1.31	+ 27.26	- 25.13	
8	π ³ Orionis	W	3	4 42 17.5	2 31.2	51.50	52.85	.....	4 15 9.10	+ 1.05	+ 18.11	- 37.80	+ 6 47 48.57
		E	...	4 47 20.0	2 31.3	50.60	52.15	.....	68 29 26.62	+ 0.23	- 18.14	+ 37.89	
9	ε Aurigæ	E	3	4 55 .....	.....	50.70	52.15	28.402	31 34 7.50	+ 0.79	+ 0.21	- 5.04	+43 41 13.29
		W	...	.....	.....	51.95	53.35	28.402	41 5 49.68	+ 2.15	- 0.21	- 5.04	
10	o Orionis	E	3	5 14 20.0	2 42.2	50.60	51.90	.....	75 45 40.02	+ 0.12	- 17.50	+ 49.67	- o 28 37.62
		W	...	5 21 6.5	4 4.3	51.45	52.75	.....	356 58 32.45	+ 0.93	+ 39.90	- 49.68	
11	158 H ¹ . Cephei	W	3	5 29 10.0	3 0.5	51.35	52.60	.....	82 35 17.62	+ 0.84	- 1.62	+ 1 3.10	+85 9 19.41
	February 22, L.	E	...	5 33 12.0	1 1.5	50.55	52.00	.....	350 9 17.30	+ 0.12	+ 0.19	- 1 3.11	
12	5 H. Camelop.	W	3	3 37 42.0	2 50.2	51.75	52.35	.....	68 29 25.68	+ 1.37	- 7.51	+ 38.77	+71 2 57.10
		E	...	3 43 4.0	2 31.8	51.00	51.90	.....	4 15 9.60	+ 0.73	+ 5.97	- 38.81	
13	φ Tauri	E	2.5	3 59 8.0	2 8.2	51.30	52.15	.....	46 32 57.68	+ 1.00	- 34.61	+ 11.13	+28 44 59.79
		W	...	4 4 8.6	2 52.4	51.70	52.35	.....	26 11 8.65	+ 1.33	+ 1 2.56	- 11.14	
14	μ Tauri	W	2.5	4 7 36.2	2 53.7	51.35	52.10	.....	6 6 37.35	+ 0.99	+ 25.11	- 36.15	+ 8 39 26.05
		E	...	4 13 33.3	3 3.4	51.85	52.40	.....	66 37 59.05	+ 1.36	- 28.00	+ 36.17	
15	35 B. Camelop.	E	3	4 33 3.0	3 16.6	51.90	52.60	.....	359 31 39.48	+ 1.50	+ 6.72	- 46.53	+75 46 33.67
		W	...	4 39 10.0	2 50.4	51.45	52.25	.....	73 12 52.58	+ 1.14	- 5.05	+ 46.50	
16	ε Aurigæ	W	3	4 51 .....	.....	51.05	51.80	27.707	30 26 27.18	- 0.06	- 0.22	- 6.43	+33 2 8.70
		E	...	.....	.....	51.40	52.20	27.707	42 14 29.48	+ 0.32	+ 0.22	+ 6.43	
17	τ Orionis	E	3	5 10 20.5	2 46.2	51.95	52.70	.....	82 13 38.68	+ 1.67	- 16.21	+ 1 4.14	- 6 56 53.59
		W	...	5 15 45.0	2 38.3	51.45	51.95	.....	350 30 56.18	+ 0.98	+ 14.70	- 1 4.15	
18	δ Orionis	W	3	5 24 46.5	2 30.1	50.85	51.55	.....	357 5 23.35	+ 0.49	+ 15.10	- 50.98	- o 22 14.10
		E	...	5 29 45.0	2 28.4	51.90	52.05	.....	75 39 11.92	+ 1.59	- 14.70	+ 50.98	
19	α Columbae	E	4	5 33 42.0	2 36.5	52.10	52.65	.....	109 22 2.58	+ 1.62	- 9.00	+ 21.76	-34 7 41.77
		W	...	5 38 56.0	2 37.5	51.40	51.80	.....	323 22 31.85	+ 0.85	+ 9.11	- 21.78	

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>								<i>° ' "</i>	<i>"</i>
18 5 59	29.8	...	...	9	Instrument in meridian, observation at II with movable thread						10 22 18.19	...
6 11	29.7	...	...	10	Instrument in meridian, observation at IX with movable thread						18 18	-5.47
6 22	29.7	...	...								18 84	-4.94
6 33	29.3	...	...								17 92	...
6 44	29.3	...	...								10 60	...
7 14	28.6	31.1	29.722								18 71	...
4 34	27.7	28.8	29.719								10 81	...
4 46	27.8	...	...								18 48	...
4 58	27.4	...	...								18 47	...
5 29	26.9	...	...								17 91	...
5 34	26.9	...	...								17 72	...
5 41	23.7	...	...								12 90	...
3 26	23.1	...	...								18 16	12.34
4 2	23.7	...	...								17 94	19.47
4 12	22.6	...	...								18 24	...
4 36	21.7	...	...								18 19	...
4 49	21.4	...	...								18 60	...
4 54	...	22.8	30.218								18 84	...
5 13	20.7	...	...								18 10	...
5 22	20.3	...	...							
5 34	20.3	...	...							
5 39	20.2	...	...							

Notes.

- 4 E One microscope reading increased 20"
 7 10, 11 Clouds
 18 E One microscope reading decreased 10"

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	ξ Aurigæ	E W	2.5 ...	5 44 20.5 5 49 35.0	2 44.3 2 30.2	52.00 51.25	52.55 51.80	.....	19 36 14.45 53 8 14.38	+ 1.53 + 0.76	+ 22.39 - 18.71	- 18.81 + 18.81	+55 41 14.53
2	ι Geminorum	W E	3 ...	5 55 44.3 6 1 7.0	2 45.2 2 37.5	50.70 52.15	51.15 52.50	.....	20 42 44.72 52 1 47.32	+ 0.18 + 1.67	+ 39.41 - 35.83	- 17.51 + 17.51	+23 16 4.75
3	η Geminorum	E W	3 ...	6 6 27.0 6 12 4.3	2 50.4 2 46.9	52.05 50.90	52.95 51.10	.....	52 45 55.35 19 58 39.38	+ 1.86 + 0.25	- 40.32 + 38.68	+ 18.40 - 18.41	+22 31 58.99
4	6 Lyncis	E W	3 ...	6 19 49.0 6 25 21.0	2 55.6 2 36.4	52.30 51.00	53.05 51.30	.....	17 3 35.70 55 40 53.22	+ 2.02 + 0.42	+ 20.83 - 16.52	- 21.95 + 21.95	+58 13 57.93
5	γ Geminorum	W E	3 ...	6 29 42.5 6 35 5.5	2 39.5 2 43.5	50.55 51.95	50.95 52.90	.....	13 55 39.92 58 48 57.35	+ 0.06 + 1.72	+ 27.12 - 28.40	- 25.88 + 25.88	+16 28 39.07
6	18 Monocerotis	E W	3 ...	6 40 15.5 6 45 37.5	2 46.9 2 35.1	52.80 51.00	53.15 51.30	.....	72 46 23.95 359 58 11.52	+ 2.26 + 0.37	- 19.80 + 17.18	+ 46.17 - 46.18	+ 2 30 41.89
7	February 23, L. ο Persei	W E	2.5 ...	3 38 ..... .....	..... .....	50.50 51.95	52.65 54.00	26.947 26.947	29 25 29.05 43 16 30.62	- 0.56 + 0.81	- 0.21 + 0.21	- 7.55 + 7.55	+31 59 37.46
8	ρ Tauri	E W	2.5 3	4 2 15.5 4 7 51.0	2 55.2 2 40.3	52.00 50.60	54.05 52.65	.....	49 3 54.55 23 40 46.32	+ 1.67 + 0.17	- 53.20 + 44.54	+ 14.04 - 14.04	+26 14 16.65
9	υ ⁴ Eridani	W E	3 ...	4 12 50.0 4 16 30.0	1 33.3 2 6.7	50.50 51.65	52.55 53.90	.....	323 28 25.78 109 16 8.12	+ 0.04 + 1.31	+ 3.20 - 5.91	-3 20.41 +3 20.42	-34 1 50.97
10	α Tauri	W E	2.5 ...	4 27 39.5 4 33 16.0	2 56.4 2 40.1	50.65 51.85	52.45 53.70	.....	13 46 12.00 58 58 21.48	+ 0.07 + 1.33	+ 32.97 - 27.15	- 25.97 + 25.98	+16 19 15.41
11	π ³ Orionis	E W	3 ...	4 41 51.0 4 47 18.0	2 57.4 2 29.6	52.15 51.30	54.25 53.15	.....	68 29 29.98 4 15 10.68	+ 1.83 + 0.81	- 24.94 + 17.73	+ 39.20 - 39.20	+ 6 47 48.67
12	ε Aurigæ	W E	2.5 ...	4 55 ..... .....	..... .....	51.10 51.80	52.75 53.95	28.500 28.500	41 5 48.75 31 34 3.88	- 0.18 + 0.67	- 0.32 + 0.32	+ 5.21 - 5.21	+43 41 13.59
13	τ Orionis	W E	3 ...	5 10 15.0 5 15 49.0	2 51.6 2 42.4	51.00 51.20	52.90 53.25	.....	350 30 55.42 82 13 39.25	+ 0.51 + 0.84	+ 17.28 - 15.48	-1 4.37 +1 4.39	- 6 56 53.39
14	δ Orionis	E W	3 ...	5 24 39.0 5 29 34.0	2 37.5 2 17.5	51.40 51.40	53.55 53.20	.....	75 39 13.95 357 5 25.10	+ 1.07 + 0.90	- 16.62 + 12.67	+ 51.14 - 51.16	- 0 22 14.33
15	α Columbæ	W E	4 ...	5 33 38.0 5 39 14.0	2 40.3 2 55.7	51.35 51.60	53.10 53.60	.....	323 22 32.02 109 22 5.08	+ 0.77 + 1.13	+ 9.44 - 11.34	-3 22.49 +3 22.60	-34 7 42.17
16	February 25, L. ο Persei	E W	2.5 ...	3 38 ..... .....	..... .....	50.20 48.60	52.10 50.50	26.800 26.800	43 16 33.10 29 25 32.82	+ 2.95 + 1.36	+ 0.21 - 0.21	+ 7.17 - 7.17	+31 59 38.36
17	ρ Tauri	W E	3 ...	4 2 19.5 4 8 32.2	2 50.9 3 21.8	48.25 50.40	50.15 52.55	.....	23 40 41.75 49 4 14.02	+ 0.23 + 2.55	+ 50.62 -1 10.55	- 13.34 + 13.35	+26 14 16.62
18	γ Tauri	E W	2.5 ...	4 11 29.5 4 17 3.5	3 1.1 2 32.9	50.10 48.50	52.40 50.40	.....	59 53 33.32 12 51 7.62	+ 2.37 + 0.51	- 33.61 + 23.96	+ 25.79 - 25.80	+15 24 5.89
19	8ο Tauri	W E	3 ...	4 22 4.0 4 27 33.0	2 47.0 2 42.0	48.05 50.35	50.15 52.50	.....	12 52 58.35 59 51 34.55	+ 0.14 + 2.55	+ 28.62 - 26.94	- 25.78 + 25.80	+15 25 59.36

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.								No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>										<i>° ' "</i>	<i>"</i>
22 5 48	19.8	21.4	30.230	7.12. Instrument in meridian, observation at IX with movable thread.								1	36 22 17.40	.....
6 0	19.7	.....	.....	16. Instrument in meridian, observation at I with movable thread.								2	18.74	.....
6 10	19.1	.....	.....									3	17.60	.....
6 23	18.7	.....	.....									4	17.84	-5.43
6 33	18.7	.....	.....									5	18.84	.....
6 44	18.7	20.1	30.256									6	17.69	.....
23 3 37	25.7	.....	.....									7	18.86	+1.27
4 1	24.0	26.1	30.443									8	17.02	+3.24
4 15	23.7	.....	.....									9	16.28	.....
4 17	23.7	.....	.....									10	20.36	.....
4 31	23.3	.....	.....									11	18.04	.....
4 45	22.7	.....	.....									12	18.87	.....
4 56	22.7	24.4	30.439									13	18.92	.....
5 11	22.2	.....	.....									14	18.52	.....
5 28	22.0	.....	.....									15	18.60	.....
5 34	21.7	.....	.....									16	18.00	+1.31
5 40	21.4	22.9	30.436									17	19.32	+3.25
25 3 37	41.0	.....	.....									18	17.08	.....
3 44	40.8	42.1	29.900									19	18.64	+7.07
4 5	39.6	.....	.....									
4 15	39.1	.....	.....									
4 25	38.6	.....	.....									

Notes.
10, 12. Clouds.
16, 17. Poor observation; hurried.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	70 B. Ursæ Minoris s. p.	E W	3.5 ...	4 32 6.0 4 37 8.0	2 32.2 2 29.8	50.00 48.60	52.05 50.55	..... .....	332 57 13.02 99 47 18.08	+ 2.12 + 0.65	- 2.36 + 2.28	-1 58.25 +1 58.31	+77 37 40.92
2	57 H ¹ . Camelop.	W E	3 ...	4 50 2.0 4 55 25.0	2 54.7 2 28.3	48.50 49.55	50.50 51.60	..... .....	71 22 27.35 1 22 9.78	+ 0.53 + 1.63	- 6.25 + 4.50	+ 41.62 - 41.64	+73 56 1.17
3	α Aurigæ	E W	2 ...	5 10 ..... .....	..... .....	50.10 48.85	51.90 50.80	27.704 27.704	29 21 30.98 43 19 21.30	+ 2.70 + 1.48	+ 0.22 - 0.22	- 7.30 + 7.30	+45 54 18.31
4	β Tauri	W E	3 ...	5 17 43.5 5 23 11.5	2 42.2 2 45.8	48.70 50.10	50.50 52.05	..... .....	25 58 3.85 46 46 35.50	+ 0.62 + 2.15	+54.35 -50.78	- 10.95 + 10.95	+28 31 44.70
5	θ ² Orionis	E W	3 ...	5 28 8.0 5 33 26.0	2 41.9 2 36.1	50.00 49.10	52.00 51.00	..... .....	80 45 38.55 351 58 54.75	+ 2.11 + 1.12	-15.82 +14.78	+ 58.36 - 58.41	- 5 28 48.80
6	β Aurigæ	W E	2 ...	5 53 ..... .....	..... .....	48.65 49.90	50.55 51.85	26.223 26.223	42 22 28.90 30 20 30.00	- 0.09 + 1.21	- 0.34 + 0.34	+ 6.30 - 6.30	+44 56 21.44
7	ξ Orionis	E W	3 ...	6 3 51.0 6 9 19.0	2 49.4 2 38.6	49.70 49.15	51.80 51.00	..... .....	61 3 52.70 11 40 44.22	+ 1.87 + 1.13	-28.26 +24.76	+ 27.49 - 27.50	+14 13 41.08
8	λ Canis Majoris	W E	4 ...	6 21 54.0 6 27 36.0	2 50.7 2 51.3	48.60 49.90	50.50 51.85	..... .....	324 58 13.78 107 46 20.92	+ 0.57 + 1.94	+11.00 -11.08	-2 56.22 +2 56.30	-32 31 32.80
9	13 H ¹ . Camelop. s. p.	E W	4 ...	15 34 20.0 15 40 4.0	2 52.6 2 51.4	49.65 50.90	50.55 51.65	..... .....	322 16 1.78 110 28 32.58	+ 1.34 + 2.48	- 5.15 + 5.08	-3 33.52 +3 33.57	+66 54 48.69
10	151 H ¹ . Cephei s. p.	W E	2.5 ...	16 4 10.0 16 9 36.0	2 56.9 2 29.1	50.55 48.90	51.15 49.55	..... .....	92 6 37.70 340 37 55.10	+ 2.05 + 0.44	+ 1.31 - 0.93	+1 30.28 -1 30.28	+85 18 49.82
11	70 B. Ursæ Minoris	E W	2.5 ...	16 32 26.0 16 37 11.0	2 12.2 2 32.8	48.70 51.15	49.50 51.90	..... .....	357 40 42.10 75 3 53.52	+ 0.26 + 2.80	+ 2.54 - 3.40	- 49.37 + 49.37	+77 37 40.06
12	57 H ¹ . Camelop. s. p.	W E	3 ...	16 49 52.0 16 54 54.0	3 4.6 1 57.4	50.70 48.65	51.45 49.45	..... .....	103 28 26.80 329 16 3.78	+ 2.27 + 0.26	+ 4.34 - 1.76	+2 25.29 -2 25.34	+73 56 2.44
13	February 27, L. Persei	E W	3 ...	3 38 ..... .....	..... .....	49.70 49.45	51.40 51.05	26.798 26.798	43 16 34.70 29 25 31.65	+ 2.01 + 1.73	+ 0.21 - 0.21	+ 7.27 - 7.27	+31 59 37.54
14	57 H ¹ . Camelop.	E W	2.5 ...	4 50 11.0 4 55 31.0	2 45.3 2 34.7	49.70 49.95	50.95 51.30	..... .....	1 22 9.28 71 22 24.75	+ 1.02 + 1.35	+ 5.59 - 4.90	- 42.25 + 42.25	+73 56 1.58
15	19 H. Camelop.	W E	2.5 ...	5 4 16.0 5 9 30.0	2 57.9 2 16.1	50.00 49.45	51.80 51.05	..... .....	76 33 57.90 356 10 38.30	+ 1.61 + 0.97	- 3.93 + 2.30	+ 51.00 - 51.03	+79 7 44.70
16	β Tauri	E W	3 ...	5 17 52.5 5 22 52.7	2 32.8 2 27.4	49.25 49.75	50.80 51.45	..... .....	46 46 25.32 25 58 9.80	+ 0.73 + 1.31	-48.24 +44.88	+ 11.11 - 11.11	+28 31 44.66
17	θ ² Orionis	W E	3 ...	5 28 17.0 5 33 16.0	2 32.6 2 26.4	49.75 49.20	51.50 50.80	..... .....	351 58 56.05 80 45 37.95	+ 1.36 + 0.74	+14.06 -12.94	- 59.21 + 59.25	- 5 28 49.69
18	β Aurigæ	E W	2.5 ...	5 53 ..... .....	..... .....	49.45 50.00	51.30 51.60	26.222 26.222	30 20 28.92 42 22 26.15	+ 1.68 + 2.10	+ 0.22 - 0.22	- 6.40 + 6.40	+44 56 21.68
19	ξ Orionis	W E	3 ...	6 3 47.0 6 9 20.0	2 53.0 2 40.0	49.05 48.90	50.95 50.65	..... .....	11 40 42.48 61 3 51.55	+ 0.70 + 0.52	+29.46 -25.20	- 27.94 + 27.95	+14 13 41.62

Time.	Ther. 3892.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
25 4 35	37.9			3. 18.	Instrument in meridian, observation at II with movable thread.				1	30 22 16.92	+15.24
4 53	37.9			6.	Instrument in meridian, observation at IX with movable thread.				2	18.76	-11.18
5 1		39.3	29.939	13.	Instrument in meridian, observation at I with movable thread.				3	18.01	
5 8	37.1								4	19.84	
5 22	36.8								5	17.72	+13.76
5 34	36.1								6	19.14	
5 51	36.2	37.1	29.944						7	18.20	+7.42
6 7	35.4								8	18.60	+19.04
6 24	35.0	36.1	29.949						9	19.08	-9.39
6 28	34.8								10	17.84	
11 35	22.7								11	18.91	+15.28
11 41	22.6	24.3	30.004						12	17.82	-11.23
16 8	22.4								13	17.86	+1.48
16 14	22.0	22.9	30.006						14	18.51	-11.33
16 50	21.8								15	18.56	
16 55	21.7	22.7	30.011						16	16.90	
27 3 37	16.0	37.9	29.988						17	18.61	+11.76
4 41	32.4			Note.					18	18.72	
4 56	32.4	34.7	30.012	12. 13	Very faint; poor.				19	19.76	+7.26
5 7	32.0										
5 21	31.4										
5 39	31.0										
5 57	29.8	31.7	30.052								
6 7	29.4										

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	λ Canis Majoris	E W	3.5 ...	6 21 55.0 6 27 32.0	2 49.4 2 47.6	49.40 50.00	51.15 51.65	..... .....	107 46 17.45 324 58 13.98	+ 0.99 + 1.55	-10.83 +10.60	+2 59.12 -2 59.24	-32 31 33.24
2	ξ Geminorum	W E	2.5 ...	6 37 13.0 6 42 42.5	2 52.2 2 37.3	49.60 49.20	51.20 51.00	..... .....	10 26 41.70 62 17 49.42	+ 1.12 + 0.86	+28.04 -23.40	- 29.60 + 29.61	+12 59 39.06
3	ε Canis Majoris	E W	3.5 ...	6 52 27.0 6 57 25.0	2 32.6 2 25.4	49.45 49.95	51.15 51.35	..... .....	104 6 12.45 328 38 20.05	+ 1.01 + 1.37	- 9.35 + 8.49	+2 27.99 -2 28.08	-28 50 58.46
4	δ Canis Majoris	W E	3.5 ...	7 2 7.0 7 7 11.0	2 30.9 2 33.1	49.40 49.65	50.80 51.45	..... .....	331 14 4.88 101 30 31.15	+ 0.87 + 1.28	+ 9.55 - 9.83	-2 11.04 +2 11.05	-26 14 58.02
5	March 2, L. 19 H. Camelop.	E W	3.5 ...	5 4 22.0 5 9 51.0	2 51.4 2 37.6	49.00 48.90	52.05 51.70	..... .....	356 10 34.68 76 33 58.92	+ 1.21 + 0.95	+ 3.65 - 3.08	- 48.69 + 48.70	+79 7 43.99
6	74 B. Camelop.	W E	3 3.5	5 24 15.0 5 30 2.0	3 2.6 2 44.4	48.35 48.15	51.45 51.45	..... .....	72 25 36.30 0 18 59.35	+ 0.62 + 0.49	- 6.23 + 5.05	+ 42.03 - 42.06	+74 59 11.61
7	ω Draconis s. P.	E W	4.5 4	5 34 44.0 5 40 14.0	2 45.2 2 44.8	48.15 48.60	51.15 51.80	..... .....	324 8 24.52 108 36 6.98	+ 0.30 + 0.85	- 4.40 + 4.38	-2 58.54 +2 58.60	+68 47 48.87
8	α Orionis	W E	3.5 4	5 47 17.0 5 52 45.0	2 51.6 2 36.4	48.45 48.80	51.25 51.80	..... .....	4 50 28.20 67 54 1.92	+ 0.51 + 0.94	+23.69 -19.68	- 35.44 + 35.43	+ 7 23 15.85
9	η Geminorum	W E	3.5 ...	6 6 32.0 6 11 45.0	2 44.4 2 28.6	48.60 49.05	51.10 52.00	..... .....	19 58 40.42 52 45 47.98	+ 0.53 + 1.28	+37.53 -30.67	- 17.01 + 17.01	+22 31 59.61
10	8 Monocerotis	E W	3.5 ...	6 16 4.0 6 21 26.0	2 47.0 2 35.0	48.95 48.65	51.90 51.50	..... .....	70 38 57.90 2 5 38.18	+ 1.13 + 0.81	-20.94 +18.04	+ 39.38 - 39.39	+ 4 38 16.75
11	ξ ² Canis Majoris	W E	4 ...	6 28 45.0 6 33 50.0	2 25.3 2 39.7	48.60 48.90	51.10 51.60	..... .....	334 34 54.85 98 9 39.78	+ 0.54 + 0.99	+ 9.36 -11.31	-1 47.44 +1 47.44	-22 53 43.13
12	ξ Geminorum	E W	4 3.5	6 37 25.0 6 42 42.0	2 39.9 2 37.1	48.80 48.60	51.60 51.35	..... .....	62 17 49.25 10 26 44.52	+ 0.94 + 0.66	-24.17 +23.34	+ 28.13 - 28.13	+12 59 39.79
13	ε Canis Majoris	W E	4 ...	6 52 16.0 6 57 42.0	2 43.2 2 42.8	48.50 48.95	50.90 51.65	..... .....	328 38 9.50 104 6 22.02	+ 0.35 + 0.97	+10.70 -10.64	-2 20.44 +2 20.46	-28 50 59.68
14	δ Canis Majoris	E W	3.5 ...	7 1 48.0 7 7 23.0	2 49.5 2 45.5	49.00 48.70	51.70 51.25	..... .....	101 30 38.92 331 13 52.40	+ 1.04 + 0.72	-12.05 +11.48	+2 4.38 -2 4.38	-26 14 59.37
15	19 Lyncis	W E	3 ...	7 12 24.5 7 17 52.5	2 53.5 2 34.5	48.50 48.70	51.30 51.35	..... .....	52 54 38.62 19 49 58.70	+ 0.58 + 0.77	-25.44 +20.17	+ 17.19 - 17.19	+55 27 30.92
16	25 Monocerotis	E W	3 ...	7 29 45.0 7 35 23.5	2 55.2 2 43.3	48.95 48.65	51.30 51.10	..... .....	79 11 19.60 353 33 15.82	+ 0.84 + 0.59	-19.12 +16.61	+ 53.54 - 53.53	- 3 54 21.01
17	26 Lyncis	W E	3 ...	7 48 ..... .....	..... .....	48.35 48.95	51.00 51.45	26.204 26.204	45 14 28.78 27 28 29.22	- 0.40 + 0.14	- 0.37 + 0.37	+ 9.04 - 9.04	+47 48 24.85
18	March 4, L. α Aurigæ	W E	2.5 ...	5 10 ..... .....	..... .....	48.55 49.00	50.55 50.95	27.630 27.630	43 19 25.80 29 21 36.60	+ 0.24 + 0.69	- 0.22 + 0.22	+ 7.30 - 7.30	+45 54 18.13

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
27 6 22	29.1	.....	.....	17. Instrument in meridian, observation at IX with movable thread.				1	36 22 18.81	+19.21
6 28	28.8	.....	.....	18. Instrument in meridian, observation at VIII with movable thread.				2	.....	.....
6 40	28.9	.....	.....					3	18.88	.....
6 52	28.3	.....	.....					4	10.96	.....
6 57	28.0	.....	.....					5	18.96	.....
7 3	28.0	.....	.....					6	18.17	.....
7 8	28.0	.....	.....					7	17.78	.....
2 5 5	46.3	47.8	30.074					8	10.34	.....
5 10	46.2	.....	29.542					9	17.78	.....
5 27	45.2	.....	.....					10	18.54	.....
5 35	44.9	.....	.....					11	17.56	.....
5 41	44.7	.....	.....					12	17.10	.....
5 50	45.5	.....	.....					13	17.27	.....
6 10	45.2	.....	.....					14	16.46	.....
6 19	45.1	46.8	29.546					15	16.26	.....
6 29	44.8	.....	.....					16	16.70	.....
6 34	44.8	.....	.....					17	17.18	.....
6 40	44.7	.....	.....					18	17.42	.....
6 53	44.6	.....	.....						18.44	.....
6 58	44.5	.....	.....					
7 2	44.2	.....	.....					
7 8	44.2	.....	.....					
7 15	44.6	.....	.....					
7 33	45.2	47.0	29.546							
7 46	45.2	.....	.....					
4 5 8	36.3	.....	.....					

Notes.
7 W, 13 E. One microscope reading decreased 10".
18. Clouds.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Leporis	E W	3 ...	5 25 32.0 5 30 6.0	3 5.7 1 28.3	49.15 49.05	50.80 50.65	.....	93 9 52.48 339 34 53.08	+ 1.29 + 1.10	-16.64 + 3.76	+1 30.90 -1 30.89	-17 53 33.82
2	γ Orionis	W E	2.5 ...	5 33 24.5 5 38 44.0	2 39.5 2 40.0	48.85 49.25	50.60 50.70	.....	355 27 56.10 77 16 40.18	+ 1.03 + 1.22	+16.47 -16.58	+ 51.64 + 51.67	- 1 59 40.59
3	α Orionis	E W	2.5 ...	5 47 22.0 5 53 0.0	2 46.3 2 51.7	49.20 49.25	50.80 50.70	.....	67 54 4.35 4 50 29.52	+ 1.20 + 1.21	-22.25 +23.72	+ 36.50 - 36.60	+ 7 23 15.65
4	Groombridge 1004	E W	3 ...	6 7 44.0 6 11 50.0	3 30.1 0 35.9	49.15 49.15	50.65 50.55	.....	348 32 56.38 84 11 37.05	+ 1.16 + 1.16	+ 1.43 - 0.04	-1 5.84 +1 5.84	+86 45 42.11
5	8 Monocerotis	W E	3 3.5	6 16 2.5 6 21 27.0	2 48.2 2 36.3	49.00 48.95	50.50 50.50	.....	2 5 37.98 70 38 56.12	+ 1.05 + 0.98	+21.24 -18.34	- 40.70 + 40.71	+ 4 38 16.72
6	ξ^2 Canis Majoris	E W	3.5 ...	6 28 15.0 6 33 50.0	2 55.0 2 40.0	48.95 49.05	50.50 50.60	.....	98 9 38.68 334 34 57.38	+ 1.02 + 1.08	-13.58 +11.36	+1 51.07 -1 51.19	-22 53 42.61
7	ϵ Geminorum	W E	3 ...	6 46 50.0 6 52 5.0	2 34.3 2 40.7	48.45 48.95	50.40 50.80	.....	10 44 48.15 61 59 50.82	+ 0.66 + 1.19	+22.73 -24.06	- 28.69 + 28.70	+13 17 40.07
8	α^2 Canis Majoris	E W	4 3.5	6 57 32.0 7 1 36.0	1 37.1 2 26.9	48.95 48.90	50.60 50.65	.....	98 57 51.70 333 46 40.32	+ 0.97 + 1.02	- 4.13 + 9.45	+1 54.94 -1 54.89	-23 42 7.12
9	λ Geminorum	W E	3 ...	7 10 23.5 7 15 17.0	2 21.9 2 31.6	48.80 49.00	50.35 50.80	.....	14 9 29.80 58 35 10.85	+ 0.85 + 1.17	+21.65 -24.71	- 24.43 + 24.45	+16 42 24.73
10	March 5, L. 19 H. Camelop.	W E	2.5 ...	5 4 16.0 5 10 2.0	2 56.6 2 49.4	48.65 48.60	50.55 50.70	.....	76 33 50.65 356 10 35.50	+ 1.10 + 1.19	- 3.87 + 3.56	+ 49.62 - 49.65	+79 7 44.62
11	74 B. Camelop.	E W	3 ...	5 24 30.0 5 30 0.0	2 47.0 2 43.0	48.35 48.95	50.40 51.10	.....	0 18 59.90 72 25 35.38	+ 0.93 + 1.61	+ 5.21 - 4.96	- 42.86 + 42.88	+74 59 12.53
12	ω Draconis s. P.	W E	3.5 ...	5 35 6.0 5 40 24.0	2 23.0 2 55.0	49.05 48.25	51.05 50.15	.....	108 36 4.98 324 8 29.35	+ 1.56 + 0.71	+ 3.29 - 4.93	+3 1.95 -3 2.01	+68 47 49.00
13	α Orionis	W E	2.5 ...	5 47 22.0 5 52 50.0	2 46.2 2 41.8	48.90 48.40	51.00 50.35	.....	4 50 31.38 67 54 4.78	+ 1.48 + 0.87	+22.23 -21.07	- 36.15 + 36.16	+ 7 23 15.77
14	40 Draconis s. P.	E W	4 ...	6 4 15.0 6 9 44.0	2 43.5 2 45.5	47.80 49.05	49.95 51.00	.....	335 18 30.10 97 26 2.65	+ 0.38 + 1.54	- 2.25 + 2.31	-1 46.36 +1 46.40	+79 59 7.81
15	β Canis Majoris	W E	3.5 ...	6 15 53.0 6 21 11.0	2 43.4 2 34.6	48.65 48.50	50.85 50.65	.....	339 33 29.78 93 11 4.92	+ 1.33 + 1.13	+12.87 -11.52	-1 30.02 +1 30.01	-17 54 48.62
16	α^2 Canis Majoris	W E	4 ...	6 56 28.0 7 2 20.0	2 41.0 3 11.0	48.60 48.90	50.60 50.70	.....	333 46 36.00 98 58 3.55	+ 1.13 + 1.31	+11.34 -15.96	-1 53.36 +1 53.33	-23 42 6.79
17	March 6, L. 158 H ¹ . Cephei	E W	2 ...	5 29 10.0 5 34 30.0	2 55.9 2 24.1	48.75 49.95	50.40 51.65	.....	350 9 16.15 82 35 17.62	+ 0.84 + 2.09	+ 1.54 - 1.03	-1 2.99 +1 2.99	+85 9 19.72

Time.	Ther. 1907.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>"</i>	<i>m</i>									<i>° ' "</i>	<i>"</i>
4 5 16	36.2	37.8	29.906								1	30 22 17.54	.....
5 26	36.1	...	...								2	19.22	.....
5 34	36.1	...	...								3	18.87	.....
5 40	35.9	...	...								4	18.57	-13.49
6 7	35.6	...	...								5	19.52	.....
6 21	35.3	36.6	29.911								6	17.91	.....
6 29	34.9	...	...								7	19.45	+ 7.39
6 44	34.4	...	...								8	19.60	.....
6 50	34.7	...	...								9	19.82	.....
6 57	34.2	...	...								10	18.15	.....
7 2	34.9	...	...								11	19.02	.....
7 14	34.7	36.0	29.912								12	17.48	.....
7 27	34.1	...	...								13	19.84	.....
7 34	37.9	39.7	29.614								14	17.48	-14.90
7 47	37.1	...	...								15	19.25	.....
7 50	37.0	...	...								16	18.57	.....
8 41	36.4	...	...								17	18.60	.....
8 50	36.7	...	...								
9 5	36.2	...	...								
9 16	36.0	...	...								
9 20	36.1	37.9	29.592										
9 30	36.1	...	...								
9 40	35.7	...	...								
9 52	34.9	...	...								
10 1	36.0	37.2	29.571										
10 10	32.2	31.2	30.682										

Notes.
1, 2, 15, 16. Clouds.
8 E. Clock time increased 1^m

No.	Date, observer, and object.	Circle.	See-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	99 B. Camelop.	W E	3 ...	5 49 41.0 5 55 13.0	2 58.4 2 33.6	49.40 48.35	51.10 50.05	..... .....	64 20 28.60 8 24 9.75	+ 1.50 + 0.41	-11.30 + 8.37	+ 32.14 - 32.15	+66 53 48.94
2	40 Draconis S. P.	W E	2.5 ...	6 4 32.0 6 9 35.0	2 26.5 2 36.5	49.85 48.00	51.30 49.70	..... .....	97 26 0.25 335 18 35.02	+ 1.82 + 0.07	+ 1.81 - 2.06	+ 49.26 - 49.26	+79 59 8.66
3	β Canis Majoris	E W	3 ...	6 15 48.0 6 21 16.0	2 48.3 2 39.7	48.15 49.30	49.90 51.05	..... .....	93 11 4.38 339 33 29.45	+ 0.27 + 1.45	-13.66 +12.30	+ 32.49 - 32.52	-17 54 49.74
4	8 Lyncis	W E	2.5 ...	6 26 25.0 6 31 50.0	2 47.0 2 38.0	49.10 48.25	50.85 50.00	..... .....	59 0 47.28 13 43 51.68	+ 1.23 + 0.40	-14.64 +13.10	+ 25.30 - 25.32	+61 33 56.32
5	e Geminorum	E W	3 ...	6 46 52.5 6 51 50.0	2 31.5 2 26.0	48.55 49.50	50.10 51.05	..... .....	61 59 47.88 10 44 43.92	+ 0.60 + 1.54	-21.92 +20.35	+ 29.11 - 29.12	+13 17 39.67
6	22 Canis Majoris	W E	3 ...	6 55 38.0 7 0 41.0	2 23.3 2 39.7	49.25 48.70	50.75 50.40	..... .....	329 40 50.58 103 3 45.68	+ 1.26 + 0.82	+ 8.39 -10.42	-2 20.22 +2 20.23	-27 48 21.49
7	λ Geminorum	E W	2.5 ...	7 10 14.0 7 15 10.5	2 31.2 2 25.3	48.65 49.65	50.15 50.95	..... .....	58 35 7.82 14 9 24.92	+ 0.66 + 1.59	-24.58 +22.70	+ 24.83 - 24.84	+16 42 24.48
8	β Canis Minoris	W E	2.5 ...	7 19 19.0 7 24 45.0	2 47.8 2 38.2	49.35 48.60	50.75 50.25	..... .....	5 55 42.55 66 48 49.60	+ 1.34 + 0.67	+23.31 -20.72	- 35.71 + 35.71	+ 8 28 29.78
9	f Puppis	E W	3 ...	7 31 15.0 7 36 36.0	2 41.3 2 39.7	48.60 49.50	50.35 51.05	..... .....	110 0 9.78 322 44 25.32	+ 0.70 + 1.53	- 9.45 + 9.26	+3 24.43 -3 24.44	-34 45 50.24
10	9 Puppis	W E	3 ...	7 44 43.0 7 50 10.0	2 45.4 2 41.6	49.15 48.65	50.65 50.35	..... .....	343 48 48.72 88 55 44.52	+ 1.16 + 0.78	+14.20 -13.56	-1 19.29 +1 19.29	-13 39 16.46
11	5 H. Camelop. S. P.	W E	3 ...	15 37 19.0 15 43 12.0	3 10.9 2 42.1	49.85 48.85	50.50 49.75	..... .....	106 21 6.82 326 23 24.00	+ 2.37 + 1.49	+ 5.33 - 3.85	+2 48.30 -2 48.27	+71 2 58.62
12	151 H ¹ . Cephei S. P.	E W	2.5 ...	16 4 8.0 16 9 50.0	2 55.4 2 46.6	48.40 50.05	49.80 51.00	..... .....	340 37 54.98 92 6 36.98	+ 1.29 + 2.71	- 1.29 + 1.16	-1 30.59 +1 30.64	+85 18 49.79
13	70 B. Ursæ Minoris	W E	2 ...	16 31 40.0 16 37 22.0	2 58.0 2 44.0	49.95 48.15	50.65 49.00	..... .....	75 3 54.30 357 40 39.95	+ 2.53 + 0.71	- 4.61 + 3.91	+ 49.56 - 49.56	+77 37 40.04
14	57 H ¹ . Camelop. S. P.	E W	2.5 ...	16 50 2.0 16 55 40.0	2 52.8 2 45.2	47.80 50.10	48.50 50.75	..... .....	329 16 6.48 103 28 25.70	+ 0.26 + 2.60	- 3.81 + 3.48	-2 25.75 +2 25.70	+73 56 3.19
15	March 8, L. 35 B. Camelop. S. P.	E W	3 ...	16 33 40.0 16 38 42.0	2 36.7 2 25.3	48.95 48.95	50.30 50.35	..... .....	331 6 21.30 101 38 10.38	+ 0.99 + 1.01	- 2.82 + 2.42	-2 10.17 +2 10.15	+75 46 36.01
16	57 H ¹ . Camelop. S. P.	W E	3 ...	16 49 56.0 16 55 54.0	2 58.5 2 59.5	48.90 48.90	50.25 50.15	..... .....	103 28 31.12 329 16 1.40	+ 0.94 + 0.95	+ 4.06 - 4.11	+2 22.03 -2 22.04	+73 56 2.36
17	19 H. Camelop. S. P.	E W	2.5 ...	17 4 18.0 17 9 48.0	2 53.8 2 36.2	48.35 48.90	49.70 50.20	..... .....	334 27 12.88 98 17 17.75	+ 0.41 + 0.95	- 2.74 + 2.21	-1 52.70 +1 52.76	+79 7 45.43

Time.	Ther. 388a.	Att. ther.	Barom.	Observations made at V with fixed thread, except as noted below.							No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>									<i>° ' "</i>	<i>"</i>
6 5 35	32.2	.....	.....								1	36 23 18.66	- 9.51
5 53	31.4	.....	.....								2	18.46	+14.97
6 5	31.0	.....	.....								3	17.08	.....
6 10	31.0	.....	.....								4	19.52	.....
6 19	30.8	.....	.....								5	18.68	+ 7.40
6 29	30.7	.....	.....								6	18.16	.....
6 36	30.6	.....	.....								7	16.55	.....
6 50	30.3	32.0	30.076								8	18.37	.....
6 56	30.1	.....	.....								9	18.56	+17.76
7 1	30.1	.....	.....								10	17.91	.....
7 13	29.7	.....	.....								11	18.10	.....
7 22	30.0	.....	.....								12	17.94	.....
7 32	30.0	.....	.....								13	18.40	+15.34
7 48	30.0	31.1	30.037								14	17.33	-11.31
15 38	22.2	24.9	30.078								15	16.63	.....
15 43.5	22.3	.....	.....								16	17.18	-11.31
16 8	21.7	.....	.....								17	15.76	.....
16 35	21.4	.....	.....								
16 44	.....	23.0	30.071										
16 50	21.3	.....	.....								
16 56	21.5	.....	.....								
17 [10]	.....	22.2	30.074										
16 34	33.0	.....	.....								
16 39	33.1	33.9	30.020										
16 50.5	33.6	.....	.....								
17 5	33.6	.....	.....								
17 10	33.3	.....	.....								

Note.
16. Clouds.

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ω Draconis	W	2.5	17 34 46.0	2 42.8	48.85	50.05	.....	66 14 21.18	+ 0.81	- 8.17	+ 34.63	+63 47 47.82
	March 9, L.	E	...	17 40 7.0	2 38.2	48.40	49.80	.....	6 30 12.60	+ 0.45	+ 7.71	- 34.03	
2	α Leporis	W	2.5	5 26 8.0	2 29.1	48.30	50.60	.....	339 34 44.50	+ 0.85	+10.73	-1 30.58	-17 53 34.50
		E	...	5 31 0.0	2 22.9	47.85	50.25	.....	93 9 46.60	+ 0.48	- 9.85	+1 30.00	
3	ζ Orionis	E	2.5	5 34 2.0	2 1.4	47.95	50.20	.....	77 16 31.58	+ 0.46	- 9.55	+ 51.40	- 1 59 40.40
	March 11, L.	W	...	5 38 1.0	1 57.6	48.85	51.15	.....	355 28 0.95	+ 1.47	+ 8.96	- 51.51	
4	σ Orionis	W	3	5 31 11.5	2 52.3	47.25	49.75	.....	354 48 12.02	+ 0.11	+18.97	- 53.08	- 2 39 23.08
		E	...	5 36 43.0	2 39.2	48.15	50.50	.....	77 56 20.50	+ 0.97	-10.19	+ 53.10	
5	99 B. Camelop.	E	2.5	5 49 51.0	2 47.6	49.70	50.30	.....	8 24 7.05	+ 0.73	+ 9.97	- 31.84	+66 53 49.11
		W	...	5 55 15.0	2 36.4	50.00	50.75	.....	64 20 26.55	+ 1.12	- 8.68	+ 31.84	
6	μ Geminorum	W	2.5	6 14 28.3	2 51.2	49.00	49.75	.....	20 0 20.50	+ 0.10	+40.76	- 17.64	+22 33 39.53
		E	...	6 20 6.2	2 46.7	49.70	50.55	.....	52 44 18.12	+ 0.85	-38.65	+ 17.05	
7	8 Lyncis	E	2.5	6 26 18.0	2 53.3	49.65	50.50	.....	13 43 48.32	+ 0.89	+15.76	- 25.07	+61 33 56.93
		W	...	6 31 50.0	2 38.7	50.00	50.60	.....	59 0 47.55	+ 1.06	-13.21	+ 25.07	
8	θ Geminorum	W	2	6 47 .....	.....	49.55	50.35	26.668	31 30 26.85	- 0.05	- 0.22	- 5.10	+34 4 25.83
		E	...	.....	.....	49.75	50.40	26.668	41 11 57.05	+ 0.16	+ 0.22	+ 5.10	
9	22 Canis Majoris	E	3	6 55 20.0	2 40.7	49.90	50.50	.....	103 3 48.80	+ 1.01	-10.55	+2 18.82	-27 48 22.20
		W	...	7 0 40.0	2 48.3	49.95	50.45	.....	329 40 46.72	+ 0.96	+11.58	-2 18.88	
10	51 Geminorum	W	2.5	7 5 12.5	2 49.1	49.50	50.25	.....	13 45 54.10	+ 0.67	+30.29	- 25.06	+16 18 57.01
		E	...	7 10 44.0	2 42.4	49.95	50.50	.....	58 58 41.18	+ 0.98	-27.94	+ 25.05	
11	7 Canis Majoris	E	3	7 17 36.0	2 48.9	49.90	50.30	.....	104 22 52.00	+ 0.86	-11.40	+2 27.92	-29 7 34.26
		W	...	7 23 6.0	2 41.1	50.00	50.50	.....	328 21 44.15	+ 1.06	+10.38	-2 28.03	
12	<i>f</i> Puppis	W	3.5	7 31 12.0	2 43.6	49.75	50.15	.....	322 44 26.10	+ 0.68	+ 9.72	-3 22.55	-34 45 49.36
		E	...	7 36 38.0	2 42.4	50.00	50.70	.....	110 0 11.80	+ 1.09	- 9.58	+3 22.06	
13	9 Puppis	E	3.5	7 44 34.0	2 53.8	49.75	50.25	.....	88 55 46.98	+ 0.81	-15.68	+1 18.63	-13 39 15.73
	March 15, L.	W	...	7 50 11.0	2 43.2	49.90	50.30	.....	343 48 49.98	+ 0.86	+13.83	-1 18.69	
14	ω Draconis S. P.	E	4	5 35 2.0	2 26.5	48.15	49.10	.....	324 8 27.12	+ 0.76	- 3.46	-3 0.46	+68 47 47.51
		W	...	5 40 42.0	3 13.5	48.75	49.90	.....	108 36 7.55	+ 1.47	+ 6.03	+3 0.58	
15	99 B. Camelop.	W	2.5	5 49 45.0	2 52.9	48.80	49.90	.....	64 20 31.22	+ 1.50	-10.61	+ 31.10	+66 53 49.37
		E	...	5 55 14.0	2 36.1	48.30	49.35	.....	8 24 9.28	+ 0.95	+ 8.65	- 31.11	
16	μ Geminorum	E	3	6 14 30.5	2 48.4	49.00	49.65	.....	52 44 18.12	+ 1.47	-39.44	+ 17.22	+22 33 39.25
		W	...	6 20 4.5	2 45.6	49.00	49.60	.....	20 0 20.20	+ 1.46	+38.14	- 17.22	
17	α Canis Majoris	W	3	6 38 36.0	2 25.9	47.90	48.90	.....	340 52 48.05	+ 0.55	+10.51	-1 25.13	-16 35 31.13
		E	...	6 43 33.0	2 31.1	48.75	49.60	.....	91 51 54.32	+ 1.30	-11.27	+1 25.19	
18	θ Canis Majoris	E	2.5	6 47 19.0	2 32.2	49.15	50.10	.....	87 12 6.50	+ 1.77	-12.41	+1 12.01	-11 55 31.63
		W	...	6 52 28.0	2 36.8	48.50	49.40	.....	345 32 29.12	+ 1.10	+13.16	-1 12.06	

Time.	Ther. 1907.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907 0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>				
8 17 15	33.0	34.1	30.038	8. Instrument in meridian, observation at IX with movable thread.	1	16 22 17.29	.....
12 40.5	31.0	.....	.....		2	16 06	.....
9 5 27	40.7	.....	.....		3	16.92	.....
5 19	40.1	42.5	30.094		4	18.05	+13.12
5 34	36.8	.....	.....		5	18.17	- 9.86
5 17	36.7	38.1	30.086		6	20.84	.....
5 31	36.3	.....	.....		7	20.18	.....
6 18	35.4	.....	.....		8	19.80	.....
6 29	35.1	.....	.....		9	19.21	.....
6 45	35.0	36.8	30.083		10	19.64	.....
6 56	34.9	.....	.....		11	18.47	.....
7 1	34.7	.....	.....		12	19.96	+18.26
7 8	35.0	.....	.....		13	18.16	.....
7 18	35.2	.....	.....		14	19.80	.....
7 21.5	34.8	.....	.....		15	20.49	-10.07
7 31.5	34.3	.....	.....		16	19.98	.....
7 37	34.1	.....	.....	Notes.	17	21.76	.....
7 47	33.6	36.0	30.096	9.3. Clouds and haze.	18	19.00	.....
15 5 15.5	48.9	.....	.....	11. Too faint; poor.			
5 41	48.6	50.1	30.114				
5 51	47.9	.....	.....		
6 21	47.7	.....	.....		
6 39	47.5	49.2	30.119				

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	51 Geminorum	E W	3 ...	7 5 13.0 7 10 39.0	2 48.0 2 38.0	49.40 48.75	49.90 49.70	..... .....	58 58 42.78 13 45 55.50	+ 1.83 + 1.45	-29.90 +26.44	+ 24.53 - 24.54	+16 18 56.45
2	η Canis Majoris	W E	4 ...	7 17 29.0 7 23 6.0	2 55.4 2 41.6	48.60 49.40	49.10 50.10	..... .....	328 21 41.18 104 22 54.75	+ 1.06 + 1.94	+12.29 -10.44	-2 25.03 +2 25.05	-29 7 34.25
3	25 Monocerotis	W E	3.5 ...	7 29 49.0 7 35 21.0	2 49.5 2 42.5	48.60 49.55	49.10 50.05	..... .....	353 33 18.42 79 11 19.05	+ 1.04 + 2.01	+17.90 -16.44	- 54.63 + 54.63	- 3 54 21.61
4	26 Lynceis	E W	2.5 ...	7 48 ..... .....	..... .....	49.70 49.10	50.35 49.75	26.067 26.067	27 28 33.02 45 14 34.92	+ 2.94 + 2.32	+ 0.37 - 0.37	- 9.21 + 9.21	+47 48 26.13
5	ρ Argūs	W E	4 ...	8 0 52.0 8 6 23.0	2 42.5 2 48.5	48.50 49.10	49.20 49.80	..... .....	333 26 20.50 99 18 15.25	+ 1.00 + 1.60	+11.49 -12.35	-1 55.09 +1 54.99	-24 2 24.15
6	35 B. Camelop. S. P.	W E	3 ...	16 33 18.0 16 38 43.0	2 57.3 2 27.7	49.05 49.70	48.90 49.70	..... .....	101 38 12.85 331 6 21.02	+ 0.47 + 1.21	+ 3.61 - 2.51	+2 10.37 -2 10.34	+75 46 34.39
7	49 Herculis	W E	2.5 ...	16 45 14.0 16 50 42.0	2 35.6 2 52.4	48.75 50.00	48.60 50.00	..... .....	12 34 44.35 60 9 59.52	+ 0.19 + 1.51	+24.58 -30.17	- 26.60 + 26.60	+15 7 39.18
8	19 H. Camelop. S. P.	W E	2.5 ...	17 4 18.0 17 9 38.0	2 52.3 2 27.7	48.90 49.65	48.95 49.80	..... .....	98 17 18.82 334 27 15.52	+ 0.47 + 1.28	+ 2.69 - 1.98	+1 52.86 -1 52.91	+79 7 46.89
9	74 B. Camelop. S. P.	E W	2.5 ...	17 24 32.0 17 29 48.0	2 43.0 2 33.0	49.45 49.45	49.55 49.50	..... .....	330 19 6.08 102 25 29.42	+ 1.05 + 1.04	- 3.19 + 2.81	-2 15.50 +2 15.51	+74 59 13.18
10	ω Draconis	E W	2.5 ...	17 34 39.0 17 40 17.0	2 49.4 2 48.6	49.50 49.50	49.80 49.75	..... .....	6 30 14.38 66 14 22.22	+ 1.16 + 1.14	+ 8.84 - 8.76	- 34.74 + 34.74	+68 47 46.50
11	δ Ursæ Minoris	W E	2.5 ...	18 0 0.0 18 5 0.0	2 14.6 2 45.4	49.15 49.85	49.20 50.00	..... .....	84 2 30.42 348 42 6.45	+ 0.68 + 1.44	- 0.62 + 0.93	+1 6.37 -1 6.39	+86 36 33.86
12	March 16, L. δ Ursæ Minoris S. P.	W E	2.5 ...	6 0 0.0 6 5 0.0	2 14.7 2 45.3	49.35 48.80	51.10 50.70	..... .....	90 49 2.45 341 55 32.12	+ 1.14 + 0.67	+ 0.56 - 0.84	+1 21.38 -1 21.45	+86 36 35.83
13	α Canis Majoris	E W	3 ...	6 33 17.0 6 43 32.0	2 44.7 2 30.3	49.05 48.65	50.50 50.15	..... .....	91 51 54.62 340 52 43.40	+ 0.64 + 0.29	-13.38 +11.14	+1 25.04 -1 25.07	-16 35 31.93
14	θ Canis Majoris	W E	3 ...	6 47 2.0 6 52 32.0	2 49.0 2 41.0	48.55 48.85	50.05 50.45	..... .....	345 32 26.32 87 12 9.05	+ 0.17 + 0.51	+15.30 -13.88	-1 11.88 +1 11.91	-11 55 32.19
15	19 Lynceis	E W	3 ...	7 12 11.0 7 17 47.0	3 5.0 2 31.0	48.95 49.65	50.30 50.80	..... .....	19 49 50.12 52 54 36.18	+ 0.55 + 1.12	+28.92 -19.28	- 17.46 + 17.47	+55 27 33.33
16	ο Geminorum	W E	2.5 ...	7 33 ..... .....	..... .....	49.45 49.45	50.55 50.40	27.273 27.273	32 13 26.92 40 28 4.68	+ 0.19 + 0.07	- 0.23 + 0.23	- 4.24 + 4.24	+34 47 53.36
17	π Geminorum	E W	2.5 ...	7 41 ..... .....	..... .....	49.25 48.85	50.20 50.05	27.021 27.021	41 37 26.55 31 4 23.95	+ 1.37 + 1.04	+ 0.22 - 0.22	+ 5.44 - 5.44	+33 38 39.53
18	ι Cancri	W E	3 ...	7 48 51.0 7 54 31.0	2 50.8 2 49.2	48.85 49.15	50.15 50.25	..... .....	13 29 10.25 59 15 24.32	+ 0.40 + 0.61	+30.59 -30.02	- 24.87 + 24.87	+16 2 14.95

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
15 6 51	46.6	.....	.....	4. 17. Instrument in meridian, observation at I with movable thread.	1	36 22 19.04	.....
7 9	45.6	.....	.....	16. Instrument in meridian, observation at IX with movable thread.	2	20.40	.....
7 14	45.2	.....	.....		3	20.99	.....
7 23.5	45.2	.....	.....		4	19.55	.....
7 34	45.0	47.0	30.145		5	18.70	.....
7 40	45.2	.....	.....		6	18.34	.....
8 1	44.6	.....	.....		7	19.99	.....
8 7	45.1	46.3	30.150		8	18.38	.....
16 33.5	35.7	.....	.....		9	18.61	.....
16 39	35.9	37.2	30.244		10	19.49	.....
16 48	36.1	.....	.....		11	19.64	.....
17 4.5	35.3	.....	.....		12	18.02	.....
17 10	35.1	.....	.....		13	18.34	.....
17 25	35.0	.....	.....		14	18.75	.....
17 30	35.0	.....	.....		15	18.81	.....
17 39	35.1	37.1	30.274		16	18.14	+0.13
18 4	35.0	.....	.....		17	18.38	.....
16 6 3	51.9	53.6	30.225		18	18.08	.....
6 41	49.4	.....	.....	Notes.			
6 50	49.1	.....	.....	4. Micrometer reading decreased 1 rev.			
7 1	48.6	50.7	30.224	11. Very faint.			
7 15	47.9	.....	.....		
7 31	47.5	.....	.....		
7 39	46.9	.....	.....		
7 52	47.0	.....	.....		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i> <i>m s</i>	<i>d</i> <i>d</i>	<i>r</i>			<i>° ' "</i> <i>"</i>	<i>"</i>	<i>"</i>	<i>' "</i> <i>"</i>	<i>° ' "</i> <i>"</i>
1	27 Lyncis	E W	3 ...	7 59 18.0 8 4 2.0	2 9.4 2 34.6	49.10 49.35	50.25 50.45	.....	23 30 53.60 49 13 50.68	+ 0.57 + 0.84	+19.76 -28.19	- 13.45 + 13.46	+51 46 34.81
2	7 Cancri	W E	3 ...	8 11 56.0 8 16 50.2	2 28.2 2 26.0	49.10 49.35	50.45 50.55	.....	24 57 39.85 47 40 55.90	+ 0.70 + 0.85	+41.79 -40.56	- 11.90 + 11.90	+27 31 7.83
3	110 B. Lyncis	E W	2 ...	8 27 .... .....	..... .....	49.05 49.35	50.30 50.55	27.840 27.840	36 55 30.10 35 45 14.88	+ 1.17 + 1.44	+ 0.17 - 0.17	+ 0.60 - 0.60	+38 20 8.41
4	19 G. Pyxidis	W E	3.5 ...	8 32 21.0 8 38 0.0	2 42.1 2 56.9	49.25 49.10	50.50 50.35	.....	335 7 39.02 97 36 56.58	+ 0.80 + 0.62	+11.76 -14.01	-1 47.18 +1 47.20	-22 20 56.35
5	0 March 18, L. Geminorum	E W	2.5 ...	6 47 .... .....	..... .....	49.60 48.45	51.10 50.00	26.687 26.687	41 11 53.68 31 30 24.80	+ 3.56 + 2.36	+ 0.22 - 0.22	+ 4.93 - 4.93	+34 4 26.45
6	22 Monocerotis	W E	3 ...	7 4 14.0 7 9 48.0	2 51.7 2 42.3	47.45 49.50	48.95 50.95	.....	357 7 2.12 75 37 32.12	+ 0.60 + 2.70	+19.77 -17.66	- 47.58 + 47.59	- 0 20 28.28
7	β Canis Minoris	E W	3 ...	7 19 15.5 7 24 48.0	2 49.8 2 42.7	40.65 48.50	50.95 49.80	.....	66 48 52.55 5 55 43.25	+ 2.75 + 1.61	-23.88 +21.93	+ 34.24 - 34.25	+ 8 28 30.08
8	24 Lyncis	W E	3 ...	7 32 18.5 7 37 44.0	2 49.2 2 36.3	47.75 49.05	49.60 50.90	.....	56 22 48.90 16 21 48.85	+ 1.07 + 2.45	-18.32 +15.63	+ 21.24 - 21.25	+58 55 50.24
9	1 Cancri	E W	3 ...	7 48 56.0 7 54 27.0	2 45.6 2 45.4	49.75 49.25	51.15 50.00	.....	59 15 23.20 13 29 10.70	+ 2.92 + 2.07	-28.76 +28.69	+ 24.65 - 24.67	+16 2 14.03
10	27 Lyncis	W E	3 ...	7 59 36.0 8 3 35.0	1 51.2 2 7.8	48.55 49.20	49.75 50.65	.....	49 13 38.95 23 30 53.02	+ 1.60 + 2.35	-14.60 +19.28	+ 13.34 - 13.35	+51 46 35.64
11	7 Cancri	E W	3 ...	8 12 2.3 8 16 40.3	2 21.8 2 22.2	49.95 49.15	50.90 50.30	.....	47 46 51.70 24 57 40.50	+ 2.87 + 2.19	-38.26 +38.48	+ 11.81 - 11.81	+27 31 7.26
12	110 B. Lyncis	W E	3 ...	8 27 .... .....	..... .....	48.45 49.40	49.50 50.55	27.952 27.952	35 45 13.50 36 55 25.65	+ 0.68 + 1.71	- 0.26 + 0.26	- 0.60 + 0.60	+38 20 9.19
13	19 G. Pyxidis	E W	3.5 ...	8 32 18.0 8 37 52.0	2 45.0 2 49.0	49.50 48.50	50.60 49.65	.....	97 36 54.95 335 7 37.28	+ 2.50 + 1.52	-12.18 +12.78	+1 46.21 -1 46.20	-22 20 56.41
14	74 March 19, L. B. Camelop. S. P.	W E	4 ...	17 24 18.0 17 30 10.0	2 56.3 2 55.7	48.20 49.20	48.70 50.45	.....	102 25 37.70 330 18 57.92	+ 0.03 + 1.40	+ 3.73 - 3.71	+2 8.91 -2 8.95	+74 59 11.50
15	δ Ursæ Minoris	E W	4 ...	18 0 4.0 18 5 0.0	2 11.7 2 44.3	48.75 48.95	50.00 49.85	.....	348 42 3.48 84 2 33.85	+ 0.98 + 0.94	+ 0.59 - 0.92	-1 3.27 +1 3.28	+86 36 34.32
16	δ March 20, L. Ursæ Minoris S. P.	E W	3 ...	5 59 50.0 6 5 10.0	2 25.9 2 54.1	48.35 48.60	49.85 50.00	.....	341 55 33.28 90 49 3.25	+ 0.61 + 0.82	- 0.66 + 0.93	-1 21.04 +1 21.08	+86 36 36.42
17	22 Monocerotis	E W	3.5 ...	7 4 19.0 7 9 52.0	2 46.5 2 46.5	49.00 49.40	50.05 50.30	.....	75 37 32.68 357 7 0.20	+ 1.05 + 1.38	-18.59 +18.59	+ 47.68 - 47.70	- 0 20 28.54
18	0 Geminorum	E W	2.5 ...	7 33 .... .....	..... .....	48.60 49.35	49.70 50.35	27.197 27.197	40 28 6.32 32 13 30.72	+ 1.37 + 2.12	+ 0.23 - 0.23	+ 4.22 - 4.22	+34 47 54.76

Time.	Ther. 3002	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.						No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>s</i>	<i>s</i>	<i>in</i>								<i>° ' "</i> <i>"</i>	<i>"</i>
16 8 2	46.6			3	Instrument in meridian, observation at II with movable thread.						30 22 18.64	.....
8 15	46.5			5 18	Instrument in meridian, observation at I with movable thread.						19.26	+ 8.69
8 25	46.0			12	Instrument in meridian, observation at IX with movable thread.						19.16	.....
8 31	45.9	47.9	30.214								17.40	-14.08
8 38	45.8										20.48	.....
15 6 42	50.6	51.1	30.022								19.81	.....
7 7	49.9										19.10	.....
7 22	49.8										19.28	.....
7 35	49.3										19.40	.....
7 52	48.6										20.10	.....
8 4	48.1	47.7	30.024								18.54	+ 2.57
8 15	48.0										20.70	.....
8 25	48.2										18.41	+14.81
8 32.5	48.1										18.32	.....
8 40	48.2	47.7	30.021								19.46	.....
12 17.5	47.0	47.9	29.925								19.11	.....
12 18.5	46.5										18.61	.....
15 4	46.5	46.7	29.916								19.38	- 0.08
6 3	46.5	46.1	29.920									
6 3	46.5											
7 7	46.0	46.2	29.949									
7 32	41.7											

No.	Date, observer, and object.	Cir- cle.	Sec- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	π Geminorum	W E	3.5 ...	7 41 ... ...	... ...	49.15 48.55	49.90 49.50	27.107 27.107	31 4 23.45 41 37 25.52	+ 0.31 - 0.19	- 0.22 + 0.22	- 5.40 + 5.40	+33 38 40.24
2	ρ Argus	E W	3.5 4	8 0 56.0 8 6 27.0	2 37.9 2 53.1	48.50 49.40	49.65 50.70	... ...	99 18 15.40 333 26 16.20	+ 0.57 + 1.57	- 10.85 + 13.03	+ 1 54.13 - 1 54.16	-24 2 24.66
3	31 Lyncis	W E	... ...	8 16 ... ...	... ...	48.95 48.15	50.15 49.40	26.162 26.162	40 55 27.52 31 47 37.95	+ 0.35 - 0.43	- 0.32 + 0.32	+ 4.68 - 4.68	+43 29 16.18
4	β Pyxidis	E W	4 ...	8 33 41.0 8 39 6.0	2 45.9 2 39.1	48.95 49.90	49.90 50.75	... ...	110 13 23.25 322 31 12.92	+ 0.95 + 1.87	- 9.96 + 9.16	+ 3 20.06 - 3 20.14	-34 58 58.60
5	γ Pyxidis	W E	4 ...	8 43 54.0 8 49 22.0	2 40.2 2 47.8	49.60 48.50	50.40 49.45	... ...	330 6 54.85 102 37 41.62	+ 1.54 + 0.50	+ 10.56 - 11.59	- 2 12.73 + 2 12.76	-27 22 7.90
6	ν Cancri	E W	3 ...	8 54 29.0 9 0 1.8	2 48.1 2 44.7	48.65 49.85	49.80 50.65	... ...	50 28 58.55 22 15 37.78	+ 0.74 + 1.81	- 44.65 + 42.85	+ 14.77 - 14.78	+24 49 5.76
7	March 22, L. 24 Lyncis	E W	3 ...	7 32 5.5 7 37 56.0	3 1.6 2 48.9	53.20 52.65	53.75 53.20	... ...	16 21 42.78 56 22 50.60	+ 0.80 + 0.20	+ 21.10 - 18.26	- 19.88 + 19.90	+58 55 50.45
8	53 Camelop.	W E	3 3.5	7 51 11.0 7 56 15.0	2 33.9 2 30.1	49.00 49.90	50.85 51.70	... ...	58 1 47.50 14 42 50.40	+ 0.30 + 1.16	- 13.38 + 12.73	+ 21.72 - 21.72	+60 34 53.41
9	ζ Cancri	E W	3 ...	8 4 1.5 8 9 32.0	2 49.7 2 40.8	50.35 50.00	51.85 51.25	... ...	57 22 8.12 15 22 29.68	+ 1.45 + 0.97	- 32.45 + 29.13	+ 20.99 - 20.97	+17 55 36.98
10	30 Monocerotis	W E	3 ...	8 18 19.0 8 23 48.0	2 40.4 2 48.6	49.30 50.35	50.85 51.45	... ...	353 51 15.98 78 53 22.58	+ 0.44 + 1.30	+ 16.12 - 17.80	- 49.92 + 49.89	- 3 36 20.05
11	β Pyxidis	W E	4 ...	8 33 40.0 8 39 10.0	2 46.7 2 43.3	50.40 49.60	51.50 51.15	... ...	322 31 2.02 110 13 37.05	+ 1.33 + 0.76	+ 10.06 - 9.65	- 3 5.62 + 3 5.64	-34 58 56.37
12	γ Pyxidis	E W	4 ...	8 43 49.0 8 49 22.0	2 44.9 2 48.1	49.50 50.50	51.00 51.95	... ...	102 37 50.38 330 6 43.05	+ 0.64 + 1.59	- 11.19 + 11.63	+ 2 3.17 - 2 3.17	-27 22 8.32
13	ν Cancri	W E	3 ...	8 54 30.5 9 0 6.5	2 46.3 2 49.7	50.35 50.35	51.55 51.50	... ...	22 15 37.00 50 29 0.20	+ 1.35 + 1.31	+ 43.69 - 45.50	- 13.71 + 13.72	+24 49 5.93
14	March 26, L. 158 H ¹ . Cephei S. P.	E W	2.5 3	17 29 40.0 17 34 40.0	2 18.5 2 41.5	48.65 50.00	49.65 51.35	... ...	340 28 22.05 92 16 12.55	+ 0.08 + 1.62	- 0.83 + 1.13	- 1 25.23 + 1 25.19	+85 9 21.16
15	δ Ursæ Minoris	W E	3 ...	18 6 2.0 18 11 10.0	3 44.8 8 52.8	50.00 48.50	51.20 49.70	... ...	84 2 33.98 348 41 54.22	+ 1.57 + 0.11	- 1.71 + 9.64	+ 1 3.45 - 1 3.45	+86 36 35.01
16	March 28, L. β Geminorum	W E	3 ...	7 37 29.0 7 42 6.5	2 5.9 2 31.6	48.10 50.40	49.70 52.05	... ...	25 41 45.20 47 3 5.90	+ 0.39 + 2.73	+ 32.00 - 46.37	- 10.37 + 10.38	+28 15 3.91
17	53 Camelop.	E W	3 ...	7 51 12.0 7 56 18.0	2 31.8 2 34.2	49.75 49.05	51.00 50.20	... ...	14 42 49.12 58 1 48.12	+ 1.84 + 1.13	+ 13.01 - 13.43	- 21.86 + 21.88	+60 34 54.42
18	ζ Cancri	W E	3 ...	8 4 3.5 8 9 32.5	2 46.7 2 42.3	48.80 49.70	50.00 51.25	... ...	15 22 30.08 57 22 4.08	+ 0.82 + 1.89	+ 31.31 - 29.68	- 21.15 + 21.16	+17 55 38.42

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
20 7 40	44.3	...	...	1, 3. Instrument in meridian, observation at IX with movable thread.					1	36 22 19.98	...
7 54	44.1	...	...						2	17.94	...
8 1	43.9	45.3	29.852						3	19.54	...
8 6.5	43.8	...	...						4	19.06	+16.98
8 15	43.6	...	...						5	18.76	+15.49
8 34	42.9	...	...						6	18.54	+ 3.51
8 39.5	42.7	...	...						7	18.62	...
8 44	42.7	...	...						8	19.36	...
8 49.5	42.6	...	...						9	18.46	...
8 58	42.3	44.4	29.856						10	19.30	...
22 7 32.5	75.1	...	...						11	20.80	+17.31
7 39	74.4	76.1	29.640						12	18.05	+15.77
7 55	74.0	...	...						13	19.03	+ 3.38
8 7	74.4	...	...						14	18.28	...
8 21	76.5	...	...						15	18.90	...
8 34	76.1	...	...						16	19.93	...
8 49.5	76.1	...	...						17	19.90	...
8 58	75.8	76.7	29.657						18	19.26	...
26 17 30	48.9	50.9	29.796								
17 35	49.1	...	...						
18 12	49.0	50.7	29.806								
28 7 38	73.5	...	...						
7 57	72.8	...	...						
8 8	72.3	...	...						

Notes.
9, 18. Mean of the close double.
14, 15. Very faint; haze.
16. Clock time a little uncertain.

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	30 Monocerotis	E	3	8 18 17.0	2 41.4	49.95	51.40	.....	78 53 18.32	+ 2.18	-16.32	+ 50.51	- 3 36 19.68
		W	...	8 23 41.0	2 42.6	49.40	50.50	.....	353 51 14.00	+ 1.44	+16.57	- 50.52	
2	σ Hydræ	W	2.5	8 31 6.0	2 45.5	49.10	50.00	.....	1 7 17.18	+ 1.03	+20.09	- 38.99	+ 3 39 57.02
		E	...	8 36 36.0	2 44.5	50.10	51.35	.....	71 37 17.15	+ 2.23	-19.86	+ 38.99	
3	σ ² Cancri (mean)	E	2.5	8 49 .....	.....	50.05	51.25	28.040	44 19 26.60	+ 2.90	+ 0.20	+ 7.74	+30 55 54.08
		W	...	.....	.....	49.35	50.35	28.040	28 20 58.25	+ 2.05	- 0.20	- 7.74	
4	κ Cancri	W	3	8 59 53.0	2 47.4	48.90	49.80	.....	8 29 32.85	+ 0.84	+24.96	- 29.17	+11 2 27.12
		E	...	9 5 26.0	2 45.6	50.00	51.20	.....	64 15 1.05	+ 2.08	-24.43	+ 29.17	
5	40 Lyncis	E	2	9 15 .....	.....	50.00	51.05	27.662	40 28 29.70	+ 2.70	+ 0.23	+ 3.99	+34 47 10.96
		W	...	.....	.....	49.25	50.15	27.662	32 12 27.65	+ 1.86	- 0.23	- 3.99	
6	h Ursæ Majoris	W	2.5	9 21 15.0	2 55.9	48.90	50.05	.....	60 55 6.35	+ 0.94	-14.12	+ 25.21	+63 28 16.02
		E	...	9 26 44.0	2 33.1	49.50	50.70	.....	11 49 32.52	+ 1.61	+10.69	- 25.23	
7	2 Sextantis	E	3	9 30 45.0	2 49.2	49.65	50.75	.....	70 13 15.75	+ 1.70	-21.73	+ 37.05	+ 5 4 2.40
		W	...	9 36 17.0	2 42.8	49.00	50.05	.....	2 31 20.28	+ 1.00	+20.11	- 37.07	
8	υ Ursæ Majoris	W	2.5	9 41 31.0	2 50.4	48.60	49.75	.....	56 55 37.82	+ 0.66	-17.82	+ 20.73	+59 28 40.32
	March 29, L.	E	...	9 47 6.0	2 44.6	49.25	50.50	.....	15 48 56.75	+ 1.34	+16.62	- 20.73	
9	α Canis Minoris	W	2.5	7 31 38.0	2 45.2	49.40	51.00	.....	2 54 55.85	+ 1.05	+20.91	- 35.83	+ 5 27 39.64
		E	...	7 37 6.0	2 42.8	49.30	50.85	.....	69 49 39.42	+ 0.96	-20.30	+ 35.87	
10	φ Geminorum	E	3	7 45 15.5	2 30.2	49.65	51.35	.....	48 17 36.72	+ 1.39	-41.30	+ 11.48	+27 0 24.60
		W	...	7 50 13.0	2 27.3	50.15	51.75	.....	24 26 54.20	+ 1.81	+39.72	- 11.49	
11	ρ Argûs	W	3.5	8 0 54.0	2 38.5	49.35	51.10	.....	333 26 11.20	+ 1.03	+10.93	-1 46.01	-24 2 24.38
		E	...	8 6 24.0	2 51.5	49.15	50.80	.....	99 18 25.12	+ 0.79	-12.79	+1 46.04	
12	31 Lyncis	E	2	8 16 .....	.....	49.20	50.85	26.218	31 47 31.90	+ 1.63	+ 0.32	- 4.35	+43 29 16.34
		W	...	.....	.....	49.95	51.20	26.218	40 55 22.72	+ 2.18	- 0.32	+ 4.35	
13	σ Hydræ	E	2.5	8 31 10.0	2 41.3	49.30	50.95	.....	71 37 16.45	+ 0.99	-19.09	+ 38.55	+ 3 39 57.32
		W	...	8 36 21.5	2 30.2	49.65	51.20	.....	1 7 19.02	+ 1.30	+16.56	- 38.57	
14	σ ² Cancri (mean)	W	5	8 49 .....	.....	49.10	50.60	27.252	28 21 32.50	+ 0.14	- 0.13	- 7.69	+30 55 53.74
		E	4.5	.....	.....	48.90	50.50	27.252	44 20 2.85	- 0.10	+ 0.13	+ 7.69	
15	κ Cancri	E	3.5	8 59 56.0	2 44.3	49.30	50.65	.....	64 15 1.18	+ 0.82	-24.04	+ 28.94	+11 2 27.30
		W	...	9 5 22.5	2 42.2	50.30	51.80	.....	8 29 31.80	+ 1.95	+23.43	- 28.93	
16	40 Lyncis	W	3.5	9 15 .....	.....	49.65	51.25	27.724	32 12 26.55	+ 0.70	- 0.15	- 3.96	+34 47 11.38
		E	...	.....	.....	49.15	50.40	27.724	40 28 29.50	+ 0.01	+ 0.15	+ 3.96	
17	h Ursæ Majoris	E	3	9 21 20.5	2 50.3	49.45	50.50	.....	11 49 30.02	+ 0.85	+13.22	- 25.00	+63 28 16.48
		W	...	9 26 58.0	2 47.2	50.25	51.50	.....	60 55 4.80	+ 1.75	-12.75	+ 25.00	
18	2 Sextantis	W	3	9 31 13.5	2 20.5	50.15	51.20	.....	2 31 25.40	+ 1.57	+14.98	- 36.72	+ 5 4 2.84
		E	...	9 35 52.0	2 18.0	49.50	50.70	.....	70 13 9.55	+ 0.96	-14.45	+ 36.74	
19	υ Ursæ Majoris	E	3	9 41 33.0	2 48.3	49.45	50.50	.....	15 48 56.12	+ 0.82	+17.38	- 20.56	+59 28 41.08
		W	...	9 47 5.5	2 44.2	50.65	52.00	.....	56 55 36.42	+ 2.24	-16.55	+ 20.58	
20	158 H ¹ Cephei s. p.	W	2.5	17 28 56.0	3 1.2	50.70	51.40	.....	92 16 13.15	+ 2.21	+ 1.42	+1 22.45	+85 9 22.50
		E	...	17 34 30.0	2 32.8	48.85	49.65	.....	340 28 20.50	+ 0.38	- 1.01	-1 22.41	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
h m			mm.				
8 21	72.1		29.776	3.5.12. Instrument in meridian, observation at I with movable thread.	1	30 22 18.39	.....
8 34	71.8	73.0	29.776	24.16. Instrument in meridian, observation at VIII with movable thread.	2	18.91	.....
8 47	71.8	.....	.....		3	18.43	.....
9 3	72.1	.....	.....		4	18.98	.....
9 14	71.8	.....	.....		5	19.04	.....
9 25	71.2	.....	.....		6	18.98	.....
9 36	70.7	.....	.....		7	18.54	+8.05
9 46	70.8	72.3	29.768		8	17.68	.....
7 12	78.6	80.0	29.668		9	18.96	.....
7 48	77.3	.....	.....		10	16.26	.....
8 1	77.1	.....	.....		11	18.16	.....
8 6.5	77.0	.....	.....		12	18.34	.....
8 15	76.5	.....	.....		13	17.60	.....
8 17	75.2	77.3	29.666	Note.	14	19.04	.....
8 50	71.5	.....	.....	4. Paint; clouds.	15	17.58	.....
9 3	74.5	.....	.....		16	10.01	.....
9 16	71.6	.....	.....		17	18.04	.....
9 24	74.1	.....	.....		18	10.02	+8.01
9 34	71.8	.....	.....		19	18.23	.....
9 45	73.0	75.2	29.666		20	18.34	.....

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	40 Draconis April 1, L.	E W	3.5 4	18 4 35.0 18 10 10.0	2 23.6 3 11.4	48.70 51.55	49.50 52.35	..... .....	355 19 16.45 77 25 20.75	+ 0.27 + 3.19	+ 2.32 - 4.12	- 48.73 + 48.74	+79 59 5.74
2	α Canis Minoris	E W	2.5 3	7 31 39.0 7 37 2.0	2 43.8 2 39.2	50.80 53.00	49.50 51.75	..... .....	69 49 34.72 2 54 59.20	+ 0.43 + 2.68	- 20.56 + 19.42	+ 39.44 - 39.45	+ 5 27 40.53
3	φ Geminorum	W E	3 ...	7 45 5.0 7 50 29.7	2 40.2 2 44.5	52.50 50.75	51.05 49.65	..... .....	24 26 50.80 48 17 48.60	+ 2.06 + 0.48	+ 46.99 - 49.54	- 12.62 + 12.63	+27 0 24.1
4	β Cancrī	E W	3 ...	8 8 41.0 8 14 12.0	2 44.3 2 46.7	52.25 52.50	51.05 51.15	..... .....	65 49 7.60 6 55 23.42	+ 1.94 + 2.13	- 22.98 + 23.65	+ 33.78 - 33.80	+ 9 28 14.15
5	σ Ursæ Majoris	W E	3 ...	8 19 49.0 8 25 17.0	2 40.9 2 47.1	52.05 51.60	50.65 50.40	..... .....	58 28 44.25 14 15 47.88	+ 1.62 + 1.31	- 14.14 + 15.25	+ 24.33 - 24.34	+61 1 54.60
6	δ Hydræ	E W	3 ...	8 29 53.0 8 35 24.5	2 48.1 2 43.4	51.65 52.40	50.50 50.95	..... .....	69 15 43.72 3 28 51.68	+ 1.37 + 1.96	- 21.96 + 20.75	+ 38.74 - 38.75	+ 6 1 33.50
7	σ^2 Cancrī (mean)	W E	2.5 ...	8 49 ..... .....	..... .....	52.00 51.25	50.45 49.70	27.376 27.376	28 21 29.00 44 19 56.72	+ 0.94 + 0.11	- 0.13 + 0.13	- 8.42 + 8.42	+30 55 54.62
8	κ Ursæ Majoris	E W	3.5 ...	8 57 ..... .....	..... .....	51.50 52.55	50.00 50.90	27.360 27.360	27 44 34.35 44 56 48.92	+ 1.58 + 2.59	+ 0.24 - 0.24	- 9.08 + 9.08	+47 31 33.25
9	γ Lyncis	W E	3.5 ...	9 8 ..... .....	..... .....	52.05 51.15	50.55 49.80	26.124 26.124	41 2 21.85 31 40 47.20	+ 0.83 - 0.01	- 0.32 + 0.32	+ 4.92 - 4.92	+43 36 8.96
10	α Hydræ	E W	3.5 ...	9 20 10.0 9 25 39.0	2 48.4 2 40.6	51.60 52.45	50.05 50.90	..... .....	83 32 14.92 349 12 22.25	+ 1.07 + 1.94	- 16.24 + 14.77	+1 4.74 -1 4.76	- 8 15 28.52
11	ϵ Hydræ April 3, L.	W E	3.5 ...	9 32 14.0 9 37 42.0	2 49.8 2 38.2	51.65 51.40	50.05 50.00	..... .....	356 44 9.60 76 0 24.30	+ 1.09 + 0.94	+ 19.18 - 16.64	- 49.75 + 49.76	- 0 43 22.50
12	β Geminorum	E W	2.5 ...	7 36 49.7 7 42 27.5	2 44.4 2 53.4	51.00 51.80	50.50 51.15	..... .....	47 3 11.80 25 41 12.92	+ 0.54 + 1.29	- 54.52 +1 0.63	+ 10.79 - 10.81	+28 15 4.32
13	φ Cancrī	W E	3 ...	8 8 41.0 8 14 16.0	2 44.0 2 51.0	50.55 51.15	50.25 50.70	..... .....	6 55 25.68 65 49 12.40	+ 0.19 + 0.72	+ 22.89 - 24.89	- 32.43 + 32.45	+ 9 28 14.43
14	σ Ursæ Majoris	E W	3 ...	8 19 44.0 8 25 23.0	2 45.6 2 53.4	50.85 51.10	50.50 50.90	..... .....	14 15 47.60 58 28 48.05	+ 0.49 + 0.78	+ 14.98 - 16.42	- 23.38 + 23.40	+61 1 54.67
15	δ Hydræ	W E	3 ...	8 30 11.0 8 35 7.0	2 29.8 2 26.2	51.00 50.85	50.85 50.50	..... .....	3 28 55.55 69 15 40.58	+ 0.71 + 0.49	+ 17.44 - 16.61	- 37.24 + 37.26	+ 6 1 33.98
16	ϵ Hydræ	E W	3 ...	8 39 9.0 8 44 34.0	2 39.0 2 46.0	50.95 51.75	50.45 51.30	..... .....	68 31 48.18 4 12 44.60	+ 0.53 + 1.32	- 20.01 + 21.81	+ 36.23 - 36.27	+ 6 45 29.87
17	κ Ursæ Majoris	W E	2.5 ...	8 57 ..... .....	..... .....	51.00 51.00	50.70 50.65	27.444 27.444	44 56 48.02 27 44 31.28	+ 0.04 + 0.01	- 0.24 + 0.24	+ 8.74 - 8.74	+47 31 33.49
18	γ Lyncis	E W	...	9 8 ..... .....	..... .....	51.20 51.50	50.65 51.20	26.120 26.120	31 40 44.08 41 2 19.50	+ 1.28 + 1.70	+ 0.21 - 0.21	- 4.73 + 4.73	+43 36 9.95
19	α Hydræ	W E	3 ...	9 20 17.0 9 25 40.0	2 41.2 2 41.8	51.05 50.80	50.70 50.30	..... .....	349 12 19.98 83 32 15.40	+ 0.64 + 0.29	+ 14.88 - 14.99	-1 2.32 +1 3.33	- 8 15 28.31

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1907 0.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>					<i>° ' "</i>		
29 17 29	64.5	66.0	29.756	7, 17.	Instrument in meridian, observation at VIII with movable thread.			1	36 22 19.44	+15.79
17 35	64.9			8, 18.	Instrument in meridian, observation at II with movable thread.			2	17.94	
18 8	64.6	65.6	29.784	9.	Instrument in meridian, observation at IX with movable thread.			3	19.70	
1 7 35	36.6							4	17.87	
7 40	...	37.3	29.972					5	18.08	
7 48	36.2							6	18.76	
8 12	35.3							7	19.80	
8 21	35.0							8	19.48	
8 36	34.8	36.1	29.973					9	20.22	- 3.19
8 47	34.6							10	19.34	
8 56	34.4							11	19.24	+ 9.41
9 6	33.9							12	16.42	
9 26	33.7							13	18.50	
9 36	33.6	34.4	29.981					14	17.75	
3 7 37	55.9	57.2	29.880					15	19.09	
7 43	54.9							16	18.20	
8 12	53.5							17	18.86	
8 22	52.7							18	18.40	- 3.38
8 33	52.2							19	18.10	
8 45	51.6									
8 56	51.2									
9 6	50.9									

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>"</i>	<i>° ' "</i>
1	ε Hydrae	E	3	9 32 20.0	2 43.6	50.70	50.10	.....	76 0 26.60	+ 0.15	- 17.80	+ 47.92	- 0 43 22.51
		W	...	9 37 47.0	2 43.4	51.70	51.10	.....	356 44 7.05	+ 1.17	+ 17.76	- 47.95	
2	19 Leonis Minoris	W	...	9 52 .....	.....	50.95	50.50	25.667	38 56 30.48	- 0.09	- 0.19	+ 2.61	+ 41 29 57.31
		E	...	.....	.....	50.80	50.45	25.667	33 47 13.98	- 0.16	+ 0.19	- 2.61	
3	γ Leonis	E	3	9 59 33.0	2 39.9	50.65	50.05	.....	58 4 45.25	+ 0.12	- 28.01	+ 23.09	+ 17 12 54.45
		W	...	10 5 1.0	2 48.1	51.30	50.65	.....	14 39 47.48	+ 0.81	+ 30.96	- 23.11	
4	γ Leonis (1st star)	W	3	10 12 7.0	2 41.1	51.00	50.60	.....	17 45 29.38	+ 0.62	+ 32.36	- 19.56	+ 20 18 40.01
		E	...	10 17 28.0	2 39.9	50.65	50.25	.....	54 59 8.08	+ 0.24	- 31.88	+ 19.57	
5	36 Ursæ Majoris	E	3	10 21 52.0	2 46.6	50.65	50.30	.....	18 49 58.38	+ 0.30	+ 21.60	- 18.37	+ 56 27 33.03
		W	...	10 27 13.0	2 34.4	51.60	51.00	.....	53 54 33.82	+ 1.09	- 18.55	+ 18.38	
6	April 9, L. ε Hydrae	W	2.5	8 39 10.0	2 37.1	50.95	50.00	.....	4 12 48.95	+ 0.47	+ 19.54	- 36.02	+ 6 45 30.07
		E	3	8 44 27.0	2 39.9	50.75	50.00	.....	68 31 49.75	+ 0.44	- 20.24	+ 36.05	
7	10 Ursæ Majoris	E	2.5	8 55 .....	.....	50.85	50.05	27.970	33 6 27.32	+ 1.14	+ 0.30	- 3.24	+ 42 9 9.08
		W	...	.....	.....	51.75	50.80	27.970	39 34 5.58	+ 1.97	- 0.30	+ 3.24	
8	April 11, L. ε Cancrī	E	3	8 41 .....	.....	51.40	50.90	27.833	46 9 25.08	+ 2.46	+ 0.18	+ 10.05	+ 29 6 2.16
		W	...	.....	.....	50.70	50.10	27.833	26 31 17.45	+ 1.68	- 0.18	- 10.05	
9	10 Ursæ Majoris	W	2.5	8 55 .....	.....	50.35	49.60	28.037	39 34 6.38	- 0.29	- 0.30	+ 3.28	+ 42 9 9.70
		E	...	.....	.....	51.30	50.55	28.037	33 6 25.15	+ 0.70	+ 0.30	- 3.28	
10	θ Hydrae	E	3	9 6 46.5	2 40.9	51.55	50.70	.....	72 34 53.55	+ 1.68	- 18.58	+ 42.57	+ 2 42 15.88
		W	...	9 12 19.0	2 51.6	50.85	50.05	.....	0 9 38.22	+ 1.02	+ 21.13	- 42.59	
11	θ Ursæ Majoris	W	2.5	9 23 51.5	2 43.0	50.10	49.50	.....	49 33 31.35	+ 0.35	- 30.36	+ 13.64	+ 52 6 12.48
		E	...	9 29 17.0	2 42.5	51.05	50.40	.....	23 11 5.42	+ 1.27	+ 30.17	- 13.65	
12	ε Leonis	E	3	9 37 47.7	2 42.7	51.35	50.50	.....	51 5 49.82	+ 1.53	- 40.31	+ 15.32	+ 24 12 8.26
		W	...	9 43 17.5	2 47.1	51.00	50.05	.....	21 38 41.45	+ 1.04	+ 42.52	- 15.32	
13	19 Leonis Minoris	E	2.5	9 52 .....	.....	51.70	50.55	25.601	33 47 13.38	+ 2.43	+ 0.30	- 2.63	+ 41 29 58.62
		W	...	.....	.....	51.15	50.10	25.601	38 56 33.32	+ 1.87	- 0.30	+ 2.63	
14	γ Leonis	W	3	9 59 33.0	2 38.8	50.55	49.80	.....	14 39 53.92	+ 0.76	+ 27.63	- 23.22	+ 17 12 55.28
		E	...	10 5 6.0	2 54.2	51.25	50.25	.....	58 4 50.45	+ 1.28	- 33.25	+ 23.24	
15	γ Leonis (1st star)	E	3	10 11 6.0	3 40.9	51.30	50.20	.....	54 59 33.82	+ 1.33	- 1 0.81	+ 19.67	+ 20 18 39.98
		W	...	10 17 40.0	2 53.1	51.05	50.15	.....	17 45 21.92	+ 1.17	+ 37.35	- 19.67	
16	36 Ursæ Majoris	W	3	10 22 2.0	2 35.4	50.95	50.05	.....	53 54 36.10	+ 1.02	- 18.79	+ 18.46	+ 56 27 35.00
		E	...	10 27 16.0	2 38.6	51.00	50.00	.....	18 49 57.78	+ 1.11	+ 19.57	- 18.46	
17	34 Sextantis	E	3	10 35 6.0	2 39.6	51.35	50.10	.....	71 13 10.32	+ 1.28	- 18.87	+ 40.66	+ 4 4 2.30
		W	...	10 40 30.0	2 44.4	51.60	50.55	.....	1 31 23.80	+ 1.65	+ 20.02	- 40.67	
18	β Ursæ Majoris	W	3	10 53 32.0	2 38.8	51.40	50.30	.....	54 19 57.50	+ 1.34	- 18.95	+ 18.96	+ 56 52 57.34
		E	...	10 59 8.0	2 57.2	51.35	50.30	.....	18 24 31.40	+ 1.34	+ 23.60	- 18.97	
19	δ Leonis	E	3	11 6 28.0	2 38.1	51.50	50.35	.....	54 15 49.75	+ 1.53	- 32.22	+ 18.89	+ 21 1 56.72
		W	...	11 12 3.0	2 56.9	51.65	50.60	.....	18 28 35.10	+ 1.66	+ 40.33	- 18.90	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.			No.	Zenith point.	Red. to 1907.0.	
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>					<i>° ' "</i>	<i>"</i>	
3 9 17	50.6	52.2	29.894	2.	Instrument in meridian, observation at VIII with movable thread.			1	36 22 17.75	+9.50
9 21	50.0	50.0	.....	7, 8, 13.	Instrument in meridian, observation at I with movable thread.			2	18.72	.....
9 35	50.0	50.0	.....	9.	Instrument in meridian, observation at IX with movable thread.			3	18.30	.....
9 50	49.1	50.0	.....					4	19.40	.....
10 2	49.1	50.0	.....					5	18.12	.....
10 15	48.2	50.0	.....					6	19.47	.....
10 25	47.9	50.5	29.886					7	18.88	.....
9 8 41	42.3	43.6	29.128					8	18.62	.....
8 53	41.9	42.8	29.136					9	19.08	.....
9 22	41.5	42.8	29.572					10	18.50	.....
11 8 39	43.4	45.1	29.572					11	19.10	.....
8 53	41.5	42.8	29.572					12	18.02	.....
9 10	42.6	43.4	29.572					13	19.64	.....
9 22	42.4	43.4	29.572					14	20.40	.....
9 41	41.8	43.4	29.572	4. 15.	Poor.			15	17.19	.....
10 5	41.2	43.4	29.572	17.	Very faint.			16	18.40	.....
10 14	40.9	43.4	29.572					17	19.10	.....
10 25	40.7	43.4	29.572					18	18.11	.....
10 38	40.5	43.4	29.572					19	18.07	.....
10 57	40.0	41.2	29.570							
11 10	39.8	41.2	29.570							

Notes.
4. 15. Poor.
17. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	April 12, L. Cancer	W E	2.5 ...	8 41 .... .....	..... .....	51.85 51.25	50.50 50.10	27.873 27.873	26 31 17.75 46 9 25.72	+ 0.06 - 0.45	- 0.18 + 0.18	- 10.05 + 10.05	+29 6 2.64
2	Ursæ Majoris	E W	2.5 ...	8 53 .... .....	..... .....	51.00 51.90	49.85 50.85	27.400 27.400	26 51 34.50 45 49 44.12	+ 0.77 + 1.75	+ 0.37 - 0.37	- 9.69 + 9.69	+48 24 31.22
3	Hydræ	W E	2.5 ...	9 7 9.0 9 12 23.0	2 18.3 2 55.7	51.45 51.15	50.15 50.00	..... .....	0 9 47.65 72 34 58.70	+ 0.44 + 0.15	+13.72 -22.15	- 42.54 + 42.55	+ 2 42 16.61
4	Ursæ Majoris	E W	2.5 ...	9 23 55.5 9 29 16.0	2 38.9 2 41.6	51.00 51.90	49.95 50.85	..... .....	23 11 8.20 49 33 29.82	+ 0.06 + 1.00	+28.85 -29.84	- 13.63 + 13.63	+52 6 12.16
5	Leonis	W E	3 ...	9 37 50.5 9 43 3.5	2 39.8 2 33.2	51.75 51.30	50.60 50.30	..... .....	21 38 46.65 51 5 47.88	+ 0.76 + 0.43	+38.88 -35.74	- 15.30 + 15.30	+24 12 8.16
6	19 Leonis Minoris	W E	2.5 ...	9 52 .... .....	..... .....	51.95 51.10	50.85 49.95	25.647 25.647	38 56 32.98 33 47 13.90	+ 0.25 - 0.61	- 0.30 + 0.30	+ 2.62 - 2.62	+41 29 58.89
7	α Leonis	E W	3 ...	10 0 32.0 10 6 3.5	2 49.1 2 42.4	51.05 51.95	50.25 50.65	..... .....	62 52 18.28 9 52 19.80	+ 0.20 + 0.86	-26.56 +24.49	+ 29.01 - 29.01	+12 25 14.20
8	μ Ursæ Majoris	W E	2.5 ...	10 17 .... .....	..... .....	51.55 51.05	50.50 50.10	25.943 25.943	39 24 28.00 33 18 55.35	- 0.14 - 0.58	- 0.30 + 0.30	+ 3.10 - 3.10	+41 58 5.94
9	ρ Leonis	E W	2.5 ...	10 25 4.5 10 30 33.5	2 46.4 2 42.6	51.00 52.05	50.00 50.70	..... .....	65 30 24.08 7 14 12.05	+ 0.04 + 0.93	-23.78 +22.71	+ 32.44 - 32.45	+ 9 47 1.83
10	34 Sextantis	W E	3 ...	10 35 12.0 10 40 35.0	2 33.5 2 49.5	51.65 51.05	50.50 50.05	..... .....	1 31 28.35 71 13 13.95	+ 0.70 + 0.15	+17.45 -21.28	- 40.55 + 40.57	+ 4 4 2.88
11	β Ursæ Majoris	E W	2.5 ...	10 53 18.0 10 58 53.0	2 52.7 2 42.3	51.00 51.90	50.10 50.90	..... .....	18 24 35.20 54 20 0.20	+ 0.11 + 0.95	+22.42 -19.80	- 18.92 + 18.92	+56 52 57.33
12	δ Leonis	W E	3 ...	11 6 16.0 11 11 43.5	2 50.0 2 37.5	51.45 51.00	50.75 50.15	..... .....	18 28 41.08 54 15 52.12	+ 0.68 + 0.20	+37.26 -31.98	- 18.84 + 18.84	+21 1 57.10
13	April 15, L. Ursæ Majoris	W E	2.5 ...	8 53 .... .....	..... .....	49.00 49.35	50.30 50.80	27.500 27.500	45 49 43.55 26 51 31.00	- 0.56 - 0.14	- 0.37 + 0.37	+ 9.70 - 9.70	+48 24 32.00
14	h Mali	E W	3 ...	9 14 38.0 9 20 6.0	2 39.7 2 48.3	49.65 49.80	50.60 50.80	..... .....	100 50 9.00 331 54 25.75	+ 0.55 + 0.75	-10.81 +12.01	+2 1.12 -2 1.13	-25 34 24.64
15	10 Leonis	W E	2.5 ...	9 29 24.5 9 34 52.0	2 48.8 2 38.7	49.25 49.55	50.60 50.85	..... .....	4 42 19.82 68 2 15.12	+ 0.35 + 0.63	+22.85 -20.20	- 35.90 + 35.91	+ 7 15 4.43
16	μ Leonis	E W	2.5 ...	9 44 38.0 9 50 10.0	2 45.9 2 46.1	49.65 50.15	50.80 51.15	..... .....	48 51 25.78 23 53 7.00	+ 0.74 + 1.16	-48.39 +48.51	+ 12.89 - 12.89	+26 26 42.98
17	α Leonis	W E	2.5 ...	10 0 33.0 10 6 7.0	2 47.6 2 46.4	49.60 49.55	50.85 51.00	..... .....	9 52 20.12 62 52 16.92	+ 0.66 + 0.70	+26.08 -25.71	- 29.01 + 29.01	+12 25 15.06
18	μ Ursæ Majoris	E W	2 ...	10 17 .... .....	..... .....	49.65 50.05	50.85 51.25	25.844 25.844	33 18 55.98 39 24 30.35	+ 1.45 + 1.85	+ 0.30 - 0.30	- 3.10 + 3.10	+41 58 6.78
19	ρ Leonis	W E	2.5 ...	10 25 2.0 10 30 29.0	2 48.4 2 38.6	49.45 49.55	50.80 50.90	..... .....	7 14 11.85 65 30 22.18	+ 0.55 + 0.67	+24.36 -21.60	- 32.49 + 32.49	+ 9 47 1.86
20	41 Leonis Minoris	E W	2.5 ...	10 35 31.5 10 41 5.8	2 45.7 2 48.6	49.65 50.10	51.00 51.10	..... .....	51 37 27.75 21 7 3.95	+ 0.84 + 1.10	-40.56 +41.99	+ 15.91 - 15.92	+23 40 30.19

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
12 8 39	40.6	.....	.....	1, 6, 8, 13. Instrument in meridian, observation at IX with movable thread. 2, 18. Instrument in meridian, observation at I with movable thread.					1	36 22 18.45	.....
8 51	41.3	43.8	29.493						2	18.17	.....
9 10	40.1	.....	.....						3	19.26	.....
9 27	39.9	.....	.....						4	19.04	.....
9 40	39.6	.....	.....						5	19.43	.....
9 50	39.6	.....	.....						6	19.27	.....
9 57	.....	41.9	29.490						7	18.54	.....
10 7	39.6	.....	.....						8	19.42	.....
10 15	39.3	.....	.....						9	18.01	.....
10 28	39.3	.....	.....						10	19.67	.....
10 57	38.1	.....	.....						11	19.54	.....
11 9	38.3	40.0	29.392						12	19.68	.....
15 8 51	46.3	.....	.....						13	18.62	.....
9 1	.....	48.0	29.745						14	18.62	.....
9 15	45.6	.....	.....						15	19.29	+6.96
9 20.5	45.6	.....	.....						16	17.40	.....
9 32	44.8	.....	.....						17	19.38	.....
9 48	45.1	.....	.....						18	18.88	.....
10 4	45.2	46.2	29.742						19	19.00	.....
10 15	44.2	.....	.....						20	17.54	.....
10 28	44.2	.....	.....						
10 38	43.8	.....	.....						

Note.
10. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	54 Leonis	W E	2.5 ...	10 47 41.5 10 53 15.0	2 48.9 2 44.6	49.60 49.90	50.70 51.10	..... .....	22 41 14.02 50 3 20.88	+ 0.65 + 1.01	+46.29 -43.96	- 14.21 + 14.22	+25 14 43.90
2	ζ Hydræ	E W	3 ...	10 58 2.0 11 3 28.0	2 44.8 2 41.2	50.05 50.35	51.25 51.25	..... .....	102 3 16.55 330 41 17.85	+ 1.17 + 1.33	-11.28 +10.80	+2 8.51 -2 8.50	-26 47 40.14
3	φ Leonis	W E	2.5 ...	11 9 15.0 11 14 34.0	2 36.7 2 42.3	49.75 49.80	50.95 51.05	..... .....	354 18 56.25 78 25 41.12	+ 0.83 + 0.96	+15.53 -16.66	- 52.65 + 52.71	- 3 8 42.48
4	τ Leonis	E W	2.5 3.5	11 20 14.5 11 25 42.0	2 50.5 2 37.0	49.80 50.35	50.70 51.45	..... .....	71 55 14.22 0 49 25.12	+ 0.74 + 1.44	-21.18 +17.96	+ 41.85 - 41.92	+ 3 22 0.08
5	ν Virginis	W E	3 ...	11 38 10.5 11 43 37.0	2 50.0 2 36.5	49.90 49.85	50.95 50.90	..... .....	4 30 12.75 68 14 21.95	+ 0.85 + 0.83	+23.05 -19.54	- 36.47 + 36.46	+ 7 2 56.84
6	April 17, L. 10 Ursæ Majoris	E W	2 ...	8 55 ..... .....	..... .....	50.50 50.15	51.25 50.60	27.914 27.914	33 6 26.55 39 34 7.50	+ 2.88 + 2.36	+ 0.30 - 0.30	- 3.30 + 3.30	+42 9 9.81
7	h Mali	W E	3.5 ...	9 14 39.0 9 19 52.0	2 38.4 2 34.6	48.75 49.50	49.50 50.40	..... .....	331 54 27.22 100 50 6.60	+ 0.36 + 1.19	+10.64 -10.14	-2 1.97 +2 2.00	-25 34 25.11
8	10 Leonis	E W	2.5 ...	9 29 20.0 9 34 52.5	2 53.0 2 39.5	50.15 49.65	50.80 50.00	..... .....	68 2 16.45 4 42 20.50	+ 1.74 + 1.08	-24.00 +20.40	+ 36.12 - 36.15	+ 7 15 4.35
9	μ Leonis	W E	2.5 3.5	9 44 33.5 9 50 2.5	2 50.0 2 39.0	48.60 49.45	49.20 50.15	..... .....	23 53 6.85 48 51 23.25	+ 0.18 + 1.12	+50.81 -44.44	- 13.00 + 13.00	+26 26 42.53
10	193 G. Hydræ	E W	4 ...	9 57 12.0 10 2 44.0	2 46.4 2 45.6	50.20 49.55	50.85 50.05	..... .....	99 6 10.92 333 38 19.08	+ 1.77 + 1.04	-12.09 +11.97	+1 53.42 -1 53.47	-23 50 21.11
11	ζ Leonis	W E	2.5 3	10 8 30.5 10 14 8.5	2 55.8 2 42.2	48.90 49.80	49.50 50.45	..... .....	21 19 21.50 51 25 7.38	+ 0.51 + 1.44	+46.18 -39.32	- 15.80 + 15.79	+23 52 50.14
12	μ Hydræ	E W	3.5 ...	10 18 43.0 10 24 11.0	2 47.8 2 40.2	49.85 49.40	50.50 49.80	..... .....	91 38 12.70 341 6 18.50	+ 1.43 + 0.84	-13.94 +12.72	+1 24.51 -1 24.51	-16 21 51.99
13	41 Leonis Minoris	W E	3 ...	10 35 26.5 10 40 52.0	2 50.4 2 35.1	48.50 49.70	49.30 50.50	..... .....	21 7 5.55 51 37 23.05	+ 0.18 + 1.43	+42.89 -35.54	- 16.03 + 16.03	+23 40 30.40
14	54 Leonis	E W	3 ...	10 47 36.5 10 53 7.0	2 53.5 2 37.0	50.10 49.50	50.65 50.05	..... .....	50 3 23.52 22 41 18.42	+ 1.72 + 1.09	-48.85 +39.99	+ 14.33 - 14.33	+25 14 43.81
15	ζ Hydræ	W E	4 ...	10 58 3.0 11 3 35.0	2 43.5 2 48.5	49.10 49.75	49.50 50.40	..... .....	330 41 19.18 102 3 18.12	+ 0.62 + 1.39	+11.11 -11.80	-2 9.58 +2 9.59	-26 47 41.39
16	φ Leonis	E W	3.5 ...	11 9 8.5 11 14 28.5	2 42.9 2 37.1	50.00 49.80	50.45 50.40	..... .....	78 25 39.45 354 18 54.88	+ 1.58 + 1.40	-16.79 +15.61	+ 53.10 - 53.12	- 3 8 42.69
17	τ Leonis	W E	3.5 5	11 20 23.0 11 25 50.0	2 41.7 2 45.3	49.10 50.00	49.65 50.60	..... .....	0 40 24.40 71 55 11.80	+ 0.60 + 1.03	+19.05 -19.91	- 42.09 + 42.09	+ 3 21 59.81
18	April 24, L. 0 Leonis	E W	2.5 3	9 33 16.0 9 38 43.0	2 49.1 2 37.9	49.70 49.85	50.30 50.30	..... .....	64 58 35.58 7 45 59.38	+ 0.98 + 1.16	-24.94 +21.75	+ 31.03 - 31.04	+10 18 50.88

Time.	Ther. (800)	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
15 10 50	43.6	...	...	6. Instrument in meridian, observation at I with movable thread.	1	36 22 19.45	+ 1.47
10 59	43.6	45.1	29.738		2	18.22	+12.01
11 6	43.6	...	...		3	19.04	+ 8.12
11 12	43.3	...	...		4	19.11	...
11 23	41.0	...	...		5	19.94	+ 5.68
11 30	40.6	...	...		6	18.22	...
11 41	40.9	...	...		7	17.95	...
11 52	41.3	43.4	29.718		8	18.07	+ 6.92
27 8 53	42.6	...	...		9	18.88	...
9 15	42.2	...	...		10	16 12	+14.73
9 20	42.1	43.0	29.734		11	18.84	...
9 32	41.9	...	...		12	16 12	...
9 47	41.2	...	...		13	18.78	...
9 57.5	41.2	...	...		14	17.94	+ 1.26
10 3	41.0	...	...		15	19.32	+12.86
10 12	40.9	42.0	29.755		16	18.06	+ 8.16
10 23	40.9	...	...	Notes	17	18.81	...
10 34	40.7	...	...	2 E. One microscope reading decreased 10".	18	16.95	...
10 50	40.1	...	...	2. Faint; clouds.			
10 59	39.9	...	...	7.9. Clouds.			
11 4	39.9	41.0	29.754	10. Very faint.			
11 12	39.6	...	...	17. Poor observation.			
11 23	39.1	...	...		
11 26	39.2	...	...		
11 33	40.7	...	29.740				
24 9 17	46.9	50.1	29.814				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	31 Leonis Minoris	W	2.5	10 22 ....	....	49.95	49.95	26.763	34 36 59.55	+ 0.32	- 0.25	- 1.71	+37 11 6.50
		E	...	....	....	50.00	50.00	26.763	38 5 15.72	+ 0.38	+ 0.25	+ 1.71	
2	48 Leonis	E	3	10 27 6.5	2 43.7	50.15	50.00	....	67 51 28.20	+ 1.20	-21.60	+ 34.54	+ 7 25 52.90
		W	...	10 32 31.0	2 40.8	50.05	50.10	....	4 53 7.55	+ 1.18	+20.83	- 34.57	
3	1 Leonis	E	3	10 41 35.0	2 40.5	50.10	50.05	....	64 15 16.80	+ 1.19	-22.94	+ 29.88	+11 2 10.22
		W	...	10 47 4.5	2 49.0	50.20	50.25	....	8 29 15.30	+ 1.35	+25.44	- 29.89	
4	β ⁴ Leonis	W	3	10 59 10.5	2 52.5	49.35	49.45	....	359 54 55.55	+ 0.46	+21.23	- 41.76	+ 2 27 31.97
		E	...	11 4 45.0	2 42.0	49.70	49.90	....	72 49 40.72	+ 0.94	-18.73	+ 41.77	
5	ε Ursæ Majoris (mean)	E	2.5	11 13 ....	....	50.00	50.05	26.740	43 13 6.15	+ 1.86	+ 0.13	+ 6.82	+32 3 10.04
		W	...	....	....	50.15	50.05	26.740	29 29 6.90	+ 1.94	- 0.13	- 6.82	
6	58 Ursæ Majoris	W	-3	11 25 ....	....	49.65	49.65	27.277	41 6 32.72	- 0.03	- 0.32	+ 4.72	+43 41 6.52
		E	...	....	....	49.65	49.70	27.277	31 35 1.58	+ 0.03	+ 0.32	- 4.72	
7	ν Virginis	E	3	11 38 17.0	2 41.3	49.95	49.85	....	68 14 22.60	+ 0.95	-20.75	+ 35.21	+ 7 2 57.42
		W	...	11 43 38.0	2 39.7	50.20	50.40	....	4 30 13.20	+ 1.35	+20.34	- 35.20	
8	π Virginis	W	3	11 53 17.5	2 42.6	49.70	49.60	....	4 35 11.02	+ 0.75	+21.13	- 35.10	+ 7 7 54.78
		E	...	11 58 44.0	2 43.9	49.85	49.80	....	68 9 26.82	+ 0.94	-21.48	+ 35.11	
9	δ Ursæ Majoris	E	3	12 8 6.0	2 37.9	49.85	49.65	....	17 44 32.85	+ 0.81	+17.76	- 19.11	+57 33 4.70
		W	...	12 13 33.0	2 49.1	50.10	50.40	....	55 0 8.50	+ 1.29	-20.37	+ 19.12	
10	15 Comæ Berenices	W	2.5	12 19 44.5	2 27.5	50.00	50.15	....	26 13 35.45	+ 1.21	+45.06	- 10.15	+28 47 8.93
		E	...	12 24 39.5	2 27.5	49.95	50.05	....	46 31 2.48	+ 1.09	-45.95	+ 10.15	
11	ρ Virginis	E	3	12 34 18.0	2 46.4	49.95	50.00	....	64 32 39.15	+ 1.05	-24.44	+ 30.37	+10 44 49.56
		W	...	12 39 43.0	2 38.6	50.75	50.95	....	8 11 58.22	+ 2.03	+22.20	- 30.37	
12	δ Virginis	W	3	12 48 3.0	2 45.9	50.55	50.70	....	1 21 26.82	+ 1.76	+20.30	- 39.74	+ 3 54 5.30
		E	...	12 53 32.0	2 43.1	50.15	50.10	....	71 23 10.32	+ 1.24	-19.62	+ 39.75	
13	θ Virginis	E	3	13 2 14.5	2 47.4	50.30	50.20	....	80 19 34.22	+ 1.39	-17.06	+ 54.69	- 5 2 38.04
		W	...	13 7 46.5	2 44.6	51.20	51.10	....	352 24 59.92	+ 2.27	+16.50	- 54.70	
14	May 4, L. 31 Leonis Minoris	E	3	10 22 ....	....	51.70	51.40	26.743	38 5 12.78	+ 3.17	+ 0.16	+ 1.76	+37 11 7.07
		W	...	....	....	51.40	51.00	26.743	34 36 58.00	+ 2.80	- 0.16	- 1.76	
15	48 Leonis	W	3	10 27 4.0	2 45.7	51.45	50.75	....	4 53 8.28	+ 2.13	+22.12	- 35.48	+ 7 25 53.75
		E	...	10 32 31.0	2 41.3	51.45	50.80	....	67 51 25.98	+ 2.18	-20.96	+ 35.50	
16	ν Hydræ	E	3	10 42 17.0	2 38.0	51.55	50.95	....	90 58 58.32	+ 2.27	-12.50	+1 21.49	-15 42 34.49
		W	...	10 47 42.0	2 47.0	52.30	51.70	....	341 45 31.95	+ 3.08	+13.97	-1 21.55	
17	α Ursæ Majoris	W	2.5	10 55 9.0	2 43.9	52.00	51.15	....	59 42 10.38	+ 2.57	-13.40	+ 25.07	+62 15 21.89
		E	...	11 0 34.0	2 41.1	51.20	50.50	....	13 2 24.28	+ 1.84	+12.94	- 25.08	
18	ν Ursæ Majoris	E	2.5	11 13 ....	....	50.60	49.55	27.673	41 39 29.08	+ 1.84	+ 0.22	+ 5.42	+33 36 10.14
		W	...	....	....	52.65	51.65	27.673	31 1 25.38	+ 3.96	- 0.22	- 5.42	
19	ε Leonis	W	3	11 20 13.5	2 48.8	52.50	51.60	....	0 49 21.72	+ 3.12	+20.76	- 41.58	+ 3 22 0.66
		E	...	11 25 43.0	2 40.7	50.40	49.50	....	71 55 12.10	+ 0.96	-18.82	+ 41.60	
20	χ Ursæ Majoris	E	3	11 41 ....	....	51.05	50.15	25.400	26 59 39.62	+ 2.23	+ 0.24	- 9.63	+48 17 48.33
		W	...	....	....	53.30	52.20	25.400	45 44 22.22	+ 4.36	- 0.24	+ 9.63	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
29 10 21	62.5	...	...	1.6. Instrument in meridian, observation at IX with movable thread.	1	36 22 19.56	....
10 30	62.2	...	...	5.18. Instrument in meridian, observation at I with movable thread.	2	18 06	+5.49
10 46	61.6	...	...	14, 20. Instrument in meridian, observation at II with movable thread.	3	18.56	....
10 58	61.3	61.1	29.877		4	20.08	....
11 12	61.0	...	...		5	19.08	....
11 21	60.6	...	...		6	19.73	+5.18
11 41	60.4	...	...		7	18.85	+4.79
11 57	60.1	62.0	29.868		8	19.00	....
12 20	59.7	...	...		9	20.42	....
12 37	59.6	...	...		10	20.12	-0.42
12 51	59.2	...	...		11	19.10	....
1 5	58.9	61.1	29.851		12	20.43	....
4 10 21	51.3	...	...		13	18.62	....
10 29	50.9	...	...		14	19.14	....
10 37	50.9	52.6	29.944		15	19.88	+5.34
10 43	50.5	...	...		16	18.52	....
10 48	50.2	...	...		17	19.10	....
10 58	49.6	...	...		18	18.87	....
11 12	49.3	...	...		19	19.93	....
11 24	48.8	...	...		20	20.14	....
11 40	48.3	50.1	29.996				

No.	Date, observer, and object.	Circle.	Seeing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	ϵ Corvi	W	4	12 2 27.0	2 46.7	51.55	50.90	.....	335 22 17.48	+ 2.22	+12.48	-1 45.04	-22 6 16.39
		E	...	12 7 58.0	2 44.3	49.45	48.60	.....	97 22 20.22	- 0.03	-12.13	+1 44.99	
2	ι Comæ Berenices	E	3	12 15 7.7	2 35.4	49.65	48.70	.....	48 56 19.25	+ 0.12	-42.22	+ 13.02	+26 21 43.75
		W	...	12 20 13.0	2 29.9	52.55	51.60	.....	23 48 15.20	+ 3.09	+39.28	- 13.03	
3	β Corvi	W	3.5	12 26 34.0	2 49.4	51.85	50.85	.....	334 35 31.22	+ 2.42	+12.73	-1 48.61	-22 53 5.33
		E	...	12 32 6.0	2 42.6	49.50	48.45	.....	98 9 4.72	- 0.04	-11.73	+1 48.61	
4	ϵ Ursæ Majoris	W	2.5	12 47 13.0	2 37.2	52.65	51.55	.....	53 54 57.62	+ 3.15	-19.21	+ 18.51	+56 27 58.31
	May 9, L.	E	3	12 52 30.0	2 39.8	50.10	49.05	.....	18 49 34.65	+ 0.60	+19.86	- 18.52	
5	ν Ursæ Majoris	W	2.5	11 13 ....	.....	50.40	50.65	27.732	31 1 27.28	+ 0.35	- 0.22	- 5.24	+33 36 10.90
		E	...	.....	.....	49.95	50.30	27.732	41 39 28.08	- 0.06	+ 0.22	+ 5.24	
6	ξ Hydræ	E	3.5	11 25 39.0	2 39.0	50.25	50.40	.....	106 35 55.58	+ 0.90	- 9.73	+2 35.34	-31 20 47.90
		W	...	11 31 9.0	2 51.0	51.05	51.35	.....	326 8 35.60	+ 1.72	+11.26	-2 35.42	
7	β Virginis	W	2.5	11 42 51.0	2 52.2	50.45	50.55	.....	359 44 37.18	+ 1.02	+21.07	- 41.92	+ 2 17 14.52
		E	...	11 48 25.0	2 41.8	49.75	50.10	.....	72 59 57.60	+ 0.49	-18.60	+ 41.94	
8	ϵ Corvi	E	3	12 2 27.0	2 45.8	50.80	51.00	.....	97 22 21.50	+ 1.40	-12.35	+1 41.63	-22 6 17.80
		W	...	12 7 53.0	2 40.2	51.45	51.50	.....	335 22 11.62	+ 1.98	+11.53	-1 41.68	
9	ι Comæ Berenices	W	2.5	12 14 55.0	2 47.2	50.70	51.00	.....	23 48 10.25	+ 1.34	+48.87	- 12.61	+26 21 45.50
		E	...	12 20 26.3	2 44.1	50.05	50.45	.....	48 56 23.70	+ 0.74	-47.07	+ 12.60	
10	β Corvi	E	3	12 26 37.0	2 45.5	50.75	50.75	.....	98 9 5.70	+ 1.20	-12.14	+1 45.06	-22 53 5.92
		W	...	12 32 5.0	2 42.5	51.85	51.55	.....	334 35 26.10	+ 2.28	+11.71	-1 45.15	
11	δ^2 Virginis	W	2.5	12 38 5.0	2 42.5	51.00	51.05	.....	5 38 4.72	+ 1.51	+21.70	- 33.70	+ 8 10 52.30
		E	...	12 43 31.0	2 43.5	50.40	50.50	.....	67 6 30.05	+ 0.95	-21.97	+ 33.71	
12	δ Virginis	E	2.5	12 48 9.0	2 38.5	50.50	50.70	.....	71 23 6.28	+ 1.14	-18.54	+ 39.71	+ 3 54 6.30
		W	...	12 53 33.0	2 45.5	51.55	51.55	.....	1 21 25.48	+ 2.13	+20.20	- 39.74	
13	θ Virginis	W	3	13 2 17.5	2 43.0	51.30	51.15	.....	352 25 1.12	+ 1.78	+16.18	- 54.68	- 5 2 37.49
		E	...	13 7 45.0	2 44.5	50.05	50.20	.....	80 19 33.62	+ 0.67	-16.48	+ 54.69	
14	ζ^1 Ursæ Majoris	E	2.5	13 17 20.0	2 44.0	50.20	50.15	.....	19 52 44.18	+ 0.68	+22.82	- 16.81	+55 24 44.88
	May 11, L.	W	...	13 22 47.0	2 43.0	51.85	51.75	.....	52 51 50.82	+ 2.41	-22.54	+ 16.81	
15	γ Leonis (1st star)	E	2.5	10 12 5.5	2 36.7	51.55	51.05	.....	54 58 59.92	+ 1.78	-30.62	+ 19.32	+20 18 43.82
		W	...	10 17 41.8	2 59.6	51.00	50.25	.....	17 45 22.92	+ 1.10	+40.22	- 19.33	
16	γ Ursæ Majoris	W	2.5	10 26 11.0	2 51.1	50.60	50.00	.....	55 0 56.52	+ 0.76	-20.84	+ 19.38	+57 33 54.09
		E	...	10 31 39.5	2 37.4	51.55	51.00	.....	17 43 40.72	+ 1.79	+17.64	- 19.39	
17	δ Leonis Minoris	E	2	10 41 ....	.....	51.60	51.05	27.928	44 5 2.90	+ 2.53	+ 0.20	+ 7.83	+31 10 22.84
		W	...	.....	.....	51.25	50.30	27.928	28 35 32.05	+ 2.00	- 0.20	- 7.83	
18	α Ursæ Majoris	E	2.5	10 55 18.0	2 33.6	51.10	50.60	.....	13 2 24.75	+ 1.28	+11.77	- 24.85	+62 15 23.56
		W	...	11 0 47.0	2 55.4	51.15	50.45	.....	59 42 16.20	+ 1.22	-15.34	+ 24.87	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
4 12 3	47.3	.....	.....	5. Instrument in meridian, observation at IX with movable thread.	1	36 22 20.10	.....
12 8	47.6	.....	.....	17. Instrument in meridian, observation at I with movable thread.	2	17.36	.....
12 17	47.7	.....	.....		3	19.66	.....
12 27	46.7	.....	.....		4	18.33	.....
12 32.5	46.8	.....	.....		5	18.98	.....
12 41	47.0	48.8	30.006		6	17.62	.....
12 51	46.6	.....	.....		7	19.39	.....
9 11 12	61.0	.....	.....		8	17.82	.....
11 24	00.3	63.1	29.703		9	18.91	.....
11 34	59.9	.....	.....		10	17.42	.....
11 46	59.5	.....	.....		11	18.48	+ 3.20
12 3	58.5	.....	.....		12	18.33	.....
12 8	58.3	.....	.....		13	18.45	.....
12 19	58.7	60.3	29.706		14	19.18	.....
12 27	58.0	.....	.....		15	17.66	.....
12 32.5	57.6	.....	.....		16	18.29	-11.29
12 41	56.9	.....	.....		17	18.90	.....
12 52	56.9	.....	.....		18	19.95	.....
13 6	56.6	.....	.....	Notes.			
13 21	56.7	58.8	29.706	2 W. One microscope reading increased 10".			
11 10 15	52.2	53.7	29.750	12 E. One microscope reading decreased 10".			
10 29	51.5	.....	.....		
10 41	50.9	.....	.....		
10 59	50.1	.....	.....		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	σ Leonis	W E	3 ...	11 13 20.5 11 19 8.0	2 42.7 2 55.8	50.40 51.05	49.80 50.55	..... .....	3 59 35.68 68 45 6.65	+ 0.57 + 1.27	+20.83 -24.33	- 36.55 + 36.57	+ 6 32 16.74
2	ϵ Hydræ	W E	4 ...	11 25 38.0 11 31 6.0	2 39.6 2 48.4	51.10 51.15	50.65 50.40	..... .....	326 8 40.22 106 35 53.60	+ 1.32 + 1.29	+ 9.81 -10.91	-2 39.15 +2 39.19	-31 20 48.92
3	β Virginis	E W	2.5 ...	11 43 4.5 11 48 30.0	2 38.5 2 47.0	51.35 51.90	50.85 51.00	..... .....	72 59 53.10 359 44 38.48	+ 1.62 + 1.91	-17.85 +19.82	+ 42.93 - 42.95	+ 2 17 15.29
4	ϵ Corvi	W E	3.5 ...	12 2 43.0 12 7 38.0	2 29.6 2 25.4	51.00 51.10	50.15 50.30	..... .....	335 22 15.92 97 22 18.40	+ 1.00 + 1.12	+10.06 - 9.50	-1 44.01 +1 44.00	-22 6 18.96
5	η Virginis	E W	3 ...	12 12 15.0 12 17 39.0	2 45.0 2 38.1	51.30 51.70	50.45 51.00	..... .....	75 26 10.78 357 18 24.55	+ 1.29 + 1.78	-18.53 +16.83	+ 46.96 - 46.97	- 0 9 5.60
6	74 Ursæ Majoris	W E	2.5 ...	12 22 46.0 12 28 23.0	2 43.5 2 53.5	51.50 51.35	50.70 50.50	..... .....	56 22 7.18 16 22 24.10	+ 1.52 + 1.36	-17.12 +19.28	+ 21.07 - 21.09	+58 55 11.06
7	76 Ursæ Majoris	E W	2.5 ...	12 34 41.0 12 40 8.0	2 42.1 2 44.9	51.45 51.85	50.55 50.60	..... .....	12 4 13.75 60 40 21.98	+ 1.42 + 1.66	+12.20 -12.63	- 26.16 + 26.18	+63 13 34.55
8	ϵ Virginis	W E	2.5 ...	12 54 54.5 12 59 49.5	2 30.5 2 24.5	50.80 51.30	49.85 50.60	..... .....	8 54 41.90 63 49 52.38	+ 0.76 + 1.47	+20.43 -18.84	- 30.16 + 30.17	+11 27 30.44
9	43 Comæ Berenices	E W	2.5 ...	13 5 1.5 13 9 48.0	2 22.8 2 23.7	51.90 51.85	50.65 50.55	..... .....	46 57 2.18 25 47 28.00	+ 1.74 + 1.71	-41.50 +42.02	+ 10.85 - 10.85	+28 21 0.36
10	ζ^1 Ursæ Majoris	W E	2.5 ...	13 17 16.5 13 22 50.5	2 47.3 2 46.7	51.25 51.20	50.55 50.55	..... .....	52 51 53.00 19 52 41.45	+ 1.41 + 1.32	-23.75 +23.58	+ 17.20 - 17.20	+55 24 45.92
11	May 13, L. 37 Ursæ Majoris	E W	2 ...	10 26 13.5 10 32 6.5	2 48.4 3 4.6	50.35 50.70	50.40 50.90	..... .....	17 43 38.85 55 1 0.70	+ 0.39 + 0.79	+20.18 -24.26	- 18.78 + 18.80	+57 33 54.26
12	42 Leonis Minoris	W E	2 ...	10 41 ..... .....	..... .....	50.50 50.05	50.85 50.20	27.946 27.946	28 35 33.92 44 5 4.25	- 0.04 - 0.62	- 0.20 + 0.20	- 7.59 + 7.59	+31 10 23.88
13	χ Hydræ	W E	3 ...	10 57 13.0 11 2 44.0	3 29.5 2 1.5	50.15 50.15	50.50 50.30	..... .....	330 41 2.35 102 3 20.92	+ 0.32 + 0.23	+18.24 - 6.14	-2 3.02 +2 3.14	-26 47 43.57
14	σ Leonis	E W	3 ...	11 13 27.0 11 18 50.0	2 45.0 2 38.0	50.20 50.90	50.35 51.05	..... .....	68 45 3.50 3 59 34.20	+ 0.26 + 1.00	-21.43 +19.65	+ 35.50 - 35.51	+ 6 32 17.32
15	ϵ Hydræ	W E	3.5 ...	11 25 37.0 11 31 4.0	2 40.4 2 46.6	50.55 50.05	51.00 50.30	..... .....	326 8 36.88 106 35 58.20	+ 0.75 + 0.21	+ 9.93 -10.09	-2 34.64 +2 34.73	-31 20 48.20
16	β Leonis	E W	2.5 ...	11 41 25.0 11 46 43.5	2 45.7 2 32.8	50.05 50.90	50.45 51.30	..... .....	60 12 8.25 12 32 31.70	+ 0.19 + 1.08	-27.84 +23.68	+ 24.79 - 24.81	+15 5 29.69
17	ϵ Corvi	E W	4 ...	12 2 24.0 12 7 52.0	2 48.4 2 39.6	50.15 51.20	50.30 51.35	..... .....	97 22 22.95 335 22 9.65	+ 0.18 + 1.24	-12.75 +11.45	+1 41.15 -1 41.16	-22 6 18.62
18	η Virginis	W E	3 ...	12 12 9.5 12 17 44.0	2 51.2 2 43.3	50.85 50.50	51.15 50.70	..... .....	357 18 21.72 75 26 10.72	+ 0.97 + 0.55	+19.72 -17.95	- 45.66 + 45.70	- 0 9 4.58
19	74 Ursæ Majoris	E W	3 ...	12 22 44.0 12 28 10.0	2 45.2 2 40.8	50.35 51.40	50.50 51.40	..... .....	16 22 26.00 56 22 8.85	+ 0.38 + 1.37	+17.48 -10.56	- 20.51 + 20.52	+58 55 11.98

Time.	Ther. 1907.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>"</i>	<i>mm</i>							
11 11 12	49.8	51.7	29.768	12 Instrument in meridian, observation at IX with movable thread				1	36 22 00.54	
11 11 26	49.7							2	12 08	
11 11 5	49.6							3	18 53	
11 11 40	49.2							4	18 50	
11 12 3	48.8							5	18 14	
11 12 8	48.9							6	18 15	- 9.55
11 12 16	48.6	50.7	29.804					7	19 70	
11 12 25	48.6							8	19 00	
11 12 32	48.1							9	17 08	
11 12 58	47.1							10	18 00	
11 13 10	45.6							11	18 14	- 11.44
11 13 24	45.6	49.9	29.821					12	18 04	
11 13 29	46.9	48.2	29.752					13	18 02	+ 14.51
11 14 1	46.8							14	18 08	
11 14 52.5	46.0							15	17 08	
11 15 1	46.4							16	18 52	
11 15 17	46.2							17	16 16	
11 15 26	46.2							18	17 58	
11 15 37	46.9	46.9	29.746	Note 11 W One microscope reading decreased 10"				19	18 50	- 9.96
11 15 44	47.6									
11 15 5	47.6									
11 15 8	47.6									
11 15 13	47.1									

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	76 Ursæ Majoris	W	3	12 34 30.0	2 52.8	51.50	51.60	.....	60 40 22.35	+ 1.53	-13.87	+ 25.47	+63 13 34.36
		E	...	12 40 8.0	2 45.2	50.55	50.55	.....	12 4 12.18	+ 0.49	+12.68	- 25.48	
2	ε Virginis	E	3.5	12 54 32.0	2 52.8	50.00	50.30	.....	63 50 0.88	+ 0.08	-26.93	+ 29.36	+11 27 30.80
		W	...	13 0 3.0	2 38.2	52.00	52.20	.....	8 54 36.58	+ 2.10	+22.56	- 29.37	
3	43 Comæ Berenices	W	3	13 4 49.8	2 34.3	52.00	52.20	.....	25 47 22.75	+ 2.14	+48.44	- 10.57	+28 21 1.10
		E	...	13 9 54.0	2 29.9	50.80	50.55	.....	46 57 8.15	+ 0.68	-45.72	+ 10.57	
4	ψ Cassiopeiæ S. P.	E	4	13 16 26.0	2 43.9	50.35	50.30	.....	322 59 15.42	+ 0.33	- 4.52	-3 7.14	+67 38 28.94
		W	...	13 22 0.0	2 50.1	52.25	52.35	.....	109 45 18.68	+ 2.35	+ 4.87	+3 7.18	
5	17 H. Canum Venat.	W	3	13 31 .....	.....	52.65	52.35	25.120	35 6 31.82	+ 1.78	- 0.26	- 1.24	+37 39 34.96
		E	...	.....	.....	50.70	50.50	25.120	37 37 53.88	- 0.09	+ 0.26	+ 1.24	
6	May 14, L. ν Hydræ	W	3	10 42 6.0	2 47.5	50.40	50.40	.....	341 45 28.60	+ 0.76	+14.05	-1 17.20	-15 42 35.38
		E	...	10 47 35.0	2 41.5	51.45	52.35	.....	90 59 3.68	+ 2.26	-13.06	+1 17.20	
7	χ Hydræ	E	3	10 58 2.0	2 40.4	51.80	52.50	.....	102 3 24.50	+ 2.54	-10.69	+2 1.11	-26 47 42.23
		W	...	11 3 22.0	2 39.6	50.95	51.35	.....	330 41 8.98	+ 1.51	+10.58	-2 1.19	
8	ε Leonis	W	3	11 16 6.0	2 50.0	50.05	50.50	.....	8 29 31.62	+ 0.63	+25.74	- 29.17	+11 2 27.22
		E	...	11 21 30.0	2 34.0	51.25	52.05	.....	64 14 57.45	+ 2.00	-21.13	+ 29.19	
9	ξ Hydræ	E	4	11 25 28.0	2 49.3	51.70	52.40	.....	106 35 59.10	+ 2.35	-11.03	+2 32.29	-31 20 48.72
		W	...	11 31 4.0	2 46.7	50.50	51.20	.....	326 8 32.70	+ 1.15	+10.70	-2 32.41	
10	β Leonis	W	2.5	11 41 24.0	2 46.5	49.85	50.70	.....	12 32 28.08	+ 0.56	+28.11	- 24.42	+15 5 30.13
		E	...	11 46 46.0	2 35.5	51.25	52.00	.....	60 12 3.38	+ 1.92	-24.52	+ 24.41	
11	γ Corvi	E	3	12 8 18.0	2 35.1	51.35	51.55	.....	92 18 2.05	+ 1.74	-11.78	+1 21.66	-17 1 40.27
		W	...	12 13 20.0	2 26.9	51.10	51.50	.....	340 26 29.50	+ 1.62	+10.57	-1 21.68	
12	α Centauri	W	3.5	12 17 47.0	2 32.5	50.55	51.00	.....	322 49 28.98	+ 1.14	+ 8.46	-3 4.98	-34 40 27.98
		E	...	12 22 46.0	2 26.5	50.70	51.40	.....	109 55 3.92	+ 1.39	- 7.81	+3 5.17	
13	23 Comæ Berenices	E	2.5	12 27 19.5	2 45.4	50.80	51.40	.....	52 9 25.22	+ 1.46	-39.24	+ 15.67	+23 8 30.90
		W	...	12 32 44.5	2 39.6	50.70	51.20	.....	20 35 9.62	+ 1.30	+36.54	- 15.68	
14	δ Virginis	E	2.5	12 38 7.0	2 40.0	50.90	51.30	.....	67 6 28.32	+ 1.41	-21.04	+ 32.98	+ 8 10 52.52
		W	...	12 43 27.0	2 40.0	50.95	51.30	.....	5 38 4.12	+ 1.41	+21.04	- 32.99	
15	α Canum Venat.	W	2	12 52 .....	.....	50.75	50.95	26.890	36 15 4.50	+ 0.61	- 0.17	- 0.10	+38 49 19.18
		E	...	.....	.....	50.25	50.75	26.890	36 26 59.10	+ 0.24	+ 0.17	+ 0.10	
16	Groombridge 2006	E	2.5	13 1 0.0	2 44.8	50.25	50.50	.....	347 9 28.02	+ 0.73	+ 0.49	-1 4.33	+88 9 10.00
		W	...	13 6 30.0	2 45.2	51.15	51.70	.....	85 35 6.15	+ 1.78	- 0.49	+1 4.34	
17	ψ Cassiopeiæ S. P.	W	4	13 16 40.0	2 29.8	51.55	51.80	.....	109 45 23.02	+ 2.06	+ 3.78	+3 3.98	+67 38 28.54
		E	...	13 21 40.0	2 30.2	50.65	50.80	.....	322 59 9.78	+ 1.07	- 3.80	-3 4.00	
18	17 H. Canum Venat.	E	2	13 31 .....	.....	50.10	50.25	25.150	37 37 50.50	+ 1.28	+ 0.27	+ 1.22	+37 39 35.42
		W	...	.....	.....	51.45	51.70	25.150	35 6 29.85	+ 2.63	- 0.27	- 1.22	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>						<i>° ' "</i>	<i>"</i>
13 12 25	60.7	.....	.....	5. Instrument in meridian, observation at IX with movable thread.				1	36 22 17.68	.....
12 37	60.3	62.7	29.753	15. Instrument in meridian, observation at VIII with movable thread.				2	17.03	.....
12 58	59.7	.....	.....	18. Instrument in meridian, observation at I with movable thread.				3	18.22	.....
13 7	59.3	.....	.....					4	18.58	+13.24
13 17	59.2	.....	.....					5	18.18	.....
13 22	59.1	.....	.....					6	18.14	.....
13 31	59.0	61.0	29.758					7	18.67	+14.55
14 10 43	73.5	76.2	29.754					8	18.16	2.76
10 48	73.5	.....	.....					9	17.42	.....
10 58.5	72.8	.....	.....					10	18.76	.....
11 3.5	72.5	.....	.....					11	16.84	.....
11 19	71.4	.....	.....					12	18.14	13.01
11 26	70.9	.....	.....					13	17.44	.....
11 32	70.5	73.1	29.754					14	17.62	2.73
11 45	70.5	.....	.....					15	19.00	.....
12 11	70.0	.....	.....					16	18.34	+13.03
12 18.5	70.1	.....	.....					17	17.94	13.40
12 23	69.5	.....	.....					18	17.84	.....
12 30	69.5	.....	.....					
12 41	69.1	71.1	29.774							
12 52	68.5	.....	.....					
13 4	68.2	.....	.....					
13 17	67.8	.....	.....					
13 22	67.8	.....	.....					
13 31	67.8	69.8	29.772							

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refrac- tion.	Apparent declination.
	May 17, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	β Crateris	W E	3.5 ...	11 4 12.0 11 9 31.0	2 44.2 2 34.8	50.35 50.60	50.60 50.90	..... .....	335 9 12.30 97 35 17.78	+ 0.51 + 0.81	+12.07 -10.73	-1 42.12 +1 42.18	-22 19 17.08
2	ϵ Leonis	E W	3 ...	11 16 5.0 11 21 31.0	2 50.8 2 35.2	50.75 50.90	51.10 51.10	..... .....	64 15 1.52 8 29 34.68	+ 0.97 + 1.09	-25.98 +21.46	+ 29.81 - 29.81	+11 2 27.11
3	α Hydræ	W E	4 ...	11 32 43.0 11 38 12.0	2 44.1 2 44.9	50.00 50.80	50.40 50.90	..... .....	323 15 55.78 109 28 38.00	+ 0.28 + 0.86	+ 9.87 - 9.97	-3 3.63 +3 3.57	-34 13 58.52
4	γ Ursæ Majoris	E W	3 ...	11 46 12.0 11 51 31.0	2 36.1 2 42.9	50.40 50.90	50.60 51.20	..... .....	21 4 34.92 51 40 2.80	+ 0.50 + 1.02	+22.92 -24.96	- 15.45 + 15.45	+54 12 52.27
5	γ Corvi	W E	3 ...	12 8 13.0 12 13 21.0	2 39.9 2 28.1	50.55 50.70	50.85 50.95	..... .....	340 26 30.42 92 18 1.92	+ 0.69 + 0.80	+12.52 -10.74	-1 23.46 +1 23.48	-17 1 41.08
6	δ Corvi	E W	3 ...	12 22 21.0 12 27 30.0	2 33.7 2 35.3	51.10 51.50	51.00 51.50	..... .....	91 16 23.98 341 28 7.12	+ 1.06 + 1.49	-11.78 +12.02	+1 20.43 -1 20.44	-16 0 0.19
7	Groombridge 1922	W E	2.5 ...	12 41 ..... .....	..... .....	50.70 50.55	50.95 50.90	25.669 25.669	43 23 30.82 29 20 12.58	+ 0.17 - 0.04	- 0.35 + 0.35	+ 6.99 - 6.99	+45 57 2.42
8	12 Canum Venat.	E W	2.5 ...	12 52 ..... .....	..... .....	50.55 51.20	50.75 51.05	26.791 26.791	36 27 0.80 36 15 7.95	+ 1.41 + 1.91	+ 0.27 - 0.27	+ 0.10 - 0.10	+38 49 20.02
9	20 Canum Venat.	W E	2.5 ...	13 13 ..... .....	..... .....	50.25 50.45	50.40 50.60	25.651 25.651	38 30 23.35 34 13 23.40	- 0.42 - 0.16	- 0.29 + 0.29	+ 2.13 - 2.13	+41 3 48.24
10	α Virginis	E W	2.5 3	13 18 35.0 13 22 49.0	1 34.4 2 39.6	50.85 51.00	50.65 50.95	..... .....	85 57 11.10 346 47 14.22	+ 0.80 + 1.03	- 4.88 +13.94	+1 6.64 -1 6.65	-10 40 39.00
11	ζ Virginis	W E	3 ...	13 27 5.0 13 32 29.0	2 43.9 2 40.1	50.60 50.70	50.40 50.50	..... .....	357 20 11.80 75 24 23.55	+ 0.47 + 0.59	+18.09 -17.27	- 46.08 + 46.10	- 0 7 17.78
12	ι Centauri	E W	4 ...	13 37 37.0 13 42 50.0	2 36.5 2 36.5	50.90 51.40	50.80 51.05	..... .....	107 49 26.58 324 55 7.52	+ 0.92 + 1.28	- 9.24 + 9.24	+2 47.97 -2 47.98	-32 34 31.52
13	May 20, L. β Crateris	E W	3 ...	11 4 3.0 11 9 36.0	2 52.9 2 40.1	51.55 51.40	51.55 51.20	..... .....	97 35 10.68 335 9 13.15	+ 1.92 + 1.65	-13.39 +11.48	+1 42.88 -1 42.94	-22 19 17.33
14	γ Crateris	W E	4 ...	11 17 15.0 11 22 42.0	2 50.1 2 36.9	50.45 51.30	50.40 51.20	..... .....	340 17 36.22 92 26 55.05	+ 0.78 + 1.57	+14.14 -12.02	-1 24.27 +1 24.32	-17 10 34.47
15	α Hydræ	E W	4 ...	11 32 41.0 11 38 18.0	2 45.7 2 51.3	52.15 51.15	52.00 51.00	..... .....	109 28 36.38 323 15 55.32	+ 2.39 + 1.47	-10.07 +10.75	+3 5.12 -3 5.15	-34 13 59.17
16	γ Ursæ Majoris	W E	3 ...	11 46 3.5 11 51 29.0	2 44.2 2 41.3	50.75 51.50	50.40 51.05	..... .....	51 40 3.80 21 4 32.52	+ 0.82 + 1.58	-25.36 +24.47	+ 15.58 - 15.60	+54 12 52.49
17	γ Corvi	E W	4 3.5	12 8 4.0 12 13 33.0	2 48.6 2 40.4	52.10 51.45	51.55 50.80	..... .....	92 18 2.58 340 26 30.80	+ 2.10 + 1.42	-13.92 +12.60	+1 24.18 -1 24.20	-17 1 40.61
18	δ Corvi	W E	3.5 ...	12 22 13.0 12 27 30.0	2 41.4 2 35.6	50.65 51.55	50.35 51.10	..... .....	341 28 9.92 91 16 24.45	+ 0.75 + 1.62	+12.98 -12.07	-1 21.10 +1 21.14	-15 59 59.75

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m s</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
17 11 5	62.0	64.2	29.794	7.9. Instrument in meridian, observation at IX with movable thread.	1	36 22 16.40	.....
11 10	61.7	.....	.....	8. Instrument in meridian, observation at I with movable thread.	2	16.87	+ 2.59
11 19	61.6	.....	.....		3	17.38	+15.25
11 31	60.7	.....	.....		4	18.60	.....
11 39	60.9	.....	.....		5	17.82	.....
11 49	60.7	.....	.....		6	16.04	.....
12 9	59.6	61.9	29.798		7	18.68	- 7.37
12 13.5	59.5	.....	.....		8	18.76	.....
12 25	59.0	.....	.....		9	19.26	.....
12 41	58.6	.....	.....		10	18.10	.....
12 42	58.6	.....	.....		11	18.62	.....
12 11.5	59.6	.....	.....		12	18.14	+ 8.71
12 21	59.6	.....	.....		13	17.22	.....
12 30	59.9	.....	.....		14	17.90	+11.42
12 38	59.6	59.1	29.792		15	18.10	+15.40
12 43	59.6	.....	.....		16	18.90	.....
12 46.5	59.9	.....	.....		17	17.78	.....
11 10	59.7	.....	.....		18	18.84	.....
11 20	59.2	.....	.....		
11 29	59.1	59.1	29.719				
11 33	58.6	.....	.....		
11 38.5	58.6	.....	.....		
11 49	58.1	.....	.....		
12 11	58.6	.....	.....		
12 25	58.1	.....	.....		
12 32	58.1	55.6	29.762				

Note.

9 W. One microscope reading decreased 10".

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° / "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° / "</i>
1	Groombridge 1922	E W	2 ...	12 41 ...	... ...	51.85 51.35	51.45 50.65	25.647 25.647	29 20 10.20 43 23 30.92	+ 2.66 + 2.10	+ 0.35 - 0.35	- 7.05 + 7.05	+45 57 3.33
2	Ursæ Majoris	E W	3 ...	12 47 7.5 12 52 38.0	2 40.6 2 49.9	51.40 51.30	50.85 50.70	..... .....	18 49 30.65 53 55 6.90	+ 1.49 + 1.34	+20.05 -22.44	- 18.09 + 18.09	+56 28 1.45
3	Groombridge 2006	W E	3 3.5	13 0 50.0 13 6 20.0	2 51.8 2 38.2	51.05 51.30	50.55 50.75	..... .....	85 35 5.78 347 9 28.30	+ 1.13 + 1.39	- 0.53 + 0.45	+1 6.28 -1 6.31	+88 9 10.97
4	Hydræ	E W	3.5 ...	13 11 8.0 13 16 23.0	2 35.4 2 39.6	51.25 51.15	50.80 50.35	..... .....	97 56 56.20 334 47 34.25	+ 1.35 + 1.12	-10.75 +11.34	+1 45.55 -1 45.60	-22 40 59.07
5	350 G. Hydræ	W E	4 ...	13 24 27.0 13 29 58.0	2 49.7 2 41.3	50.55 51.30	50.00 50.60	..... .....	329 16 6.40 103 28 25.62	+ 0.52 + 1.23	+11.68 -10.56	-2 15.13 +2 15.19	-28 12 57.45
6	Centauri	E W	4 ...	13 37 26.0 13 42 54.0	2 47.3 2 40.7	51.50 51.15	50.90 50.25	..... .....	107 49 27.80 324 55 7.82	+ 1.57 + 1.03	-10.55 + 9.74	+2 49.59 -2 49.79	-32 34 33.25
7	Hydræ	W E	4 ...	13 50 24.0 13 55 46.0	2 45.7 2 36.3	50.65 51.40	50.00 50.45	..... .....	332 57 29.90 99 47 1.85	+ 0.67 + 1.26	+11.85 -10.54	-1 54.45 +1 54.57	-24 31 13.03
8	May 23, L. Corvi	W E	3.5 ...	12 8 7.0 12 13 24.0	2 45.1 2 31.9	50.00 50.85	50.50 51.35	..... .....	340 26 28.08 92 18 2.05	+ 0.16 + 1.00	+13.35 -11.30	-1 22.85 +1 22.85	-17 1 40.93
9	Canum Venat.	E W	2.5 ...	12 21 ...	... ...	50.85 50.30	51.20 50.50	27.857 27.857	35 43 26.68 36 57 15.30	+ 1.62 + 0.96	+ 0.18 - 0.18	- 0.60 + 0.60	+39 32 10.95
10	Comæ Berenices	W E	2.5 ...	12 27 19.7 12 32 43.5	2 44.2 2 39.6	50.00 50.95	50.50 51.35	..... .....	20 35 11.90 52 9 22.58	+ 0.22 + 1.16	+38.68 -36.54	- 15.90 + 15.89	+23 8 32.45
11	d ² Virginis	E W	3 ...	12 38 1.0 12 43 25.0	2 45.0 2 39.0	50.90 50.55	51.15 50.85	..... .....	67 6 27.78 5 38 5.10	+ 0.96 + 0.59	-22.37 +20.78	+ 33.41 - 33.44	+ 8 10 53.17
12	48 Virginis	W E	3 ...	12 56 45.0 13 1 26.0	2 12.8 2 28.2	50.35 50.80	50.45 51.05	..... .....	354 17 49.82 78 26 47.40	+ 0.43 + 0.88	+11.15 -13.88	- 50.74 + 50.75	- 3 9 50.69
13	20 Canum Venat.	E W	2.5 ...	13 13 ...	... ...	51.00 50.70	50.85 50.70	25.598 25.598	34 13 22.18 38 30 24.88	+ 1.51 + 1.20	+ 0.19 - 0.19	- 2.11 + 2.11	+41 3 49.67
14	June 3, L. Centauri	E W	3.5 ...	12 18 26.0 12 23 42.0	1 50.2 3 25.8	49.50 50.55	49.80 50.95	..... .....	109 55 2.82 322 49 23.30	+ 1.23 + 2.39	- 4.42 +15.41	+3 6.81 -3 6.90	-34 40 29.58
15	Virginis (mean)	W E	3 ...	12 34 3.0 12 39 34.0	2 42.5 2 48.5	49.95 48.95	50.05 49.20	..... .....	356 31 6.92 76 13 35.25	+ 1.59 + 0.68	+17.48 -18.79	- 46.72 + 46.75	- 0 56 25.77
16	48 Virginis	E W	2.5 ...	12 56 11.0 13 1 39.0	2 44.6 2 43.4	49.50 51.20	49.70 51.10	..... .....	78 26 50.50 354 17 44.20	+ 1.16 + 2.81	-17.13 +16.88	+ 50.59 - 50.60	- 3 9 49.38
17	Hydræ	W E	2.5 ...	13 10 51.0 13 16 29.0	2 49.8 2 48.2	50.30 49.25	50.45 49.50	..... .....	334 47 31.18 97 57 3.42	+ 2.02 + 0.95	+12.83 -12.59	-1 43.30 +1 43.33	-22 40 59.65

Time.	Ther. 388z.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° / "</i>	<i>"</i>
20 12 41	53.9	...	...	1 Instrument in meridian, observation at I with movable thread.					1	36 22 18.95	- 7.92
12 47.5	53.9	...	...	9, 13. Instrument in meridian, observation at II with movable thread.					2	19.00	...
12 53	53.9	...	...						3	18.24	-14.17
13 1	53.6	...	...						4	16.73	...
13 6.5	53.4	...	...						5	17.48	+ 9.13
13 11.5	53.0	...	...						6	18.60	+ 9.06
13 16.5	52.9	...	...						7	17.56	+ 7.27
13 24.5	52.4	...	...						8	17.12	...
13 30	52.2	...	...						9	18.54	- 7.16
13 37.5	52.2	...	...						10	19.00	...
13 43	51.7	53.7	29.808						11	16.40	+ 1.92
13 50.5	51.8	...	...						12	17.90	+ 4.74
13 56	51.3	...	...						13	18.90	...
23 12 8	64.2	65.9	29.846						14	20.32	+14.38
12 13.5	64.1	...	...						15	21.58	...
12 22	63.9	...	...						16	19.20	+ 4.25
12 30	63.9	...	...						17	18.92	...
12 41	63.6	...	...						
12 59	63.6	...	...						
13 14	63.2	...	...						
13 20	...	64.6	29.858	Notes.							
3 12 18.5	62.7	...	...	3, 14. Very faint.							
12 24	61.6	64.1	29.619	11, 12, 13. Clouds.							
12 37	61.6	...	...						
13 2	61.3	...	...						
13 11	61.2	62.6	29.638								
13 16.5	61.1	...	...						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	350 G. Hydræ	E	3.5	13 24 27.0	2 47.0	49.20	49.40	.....	103 28 34.40	+ 0.84	- 11.31	+2 12.14	-28 12 58.74
		W	...	13 30 2.0	2 48.0	51.15	51.35	.....	329 16 3.52	+ 2.94	+ 11.46	-2 12.40	
2	Centauri	W	4	13 37 28.0	2 42.6	50.45	50.30	.....	324 55 4.15	+ 1.98	+ 9.97	-2 46.69	-32 34 33.29
		E	...	13 43 0.0	2 49.4	49.10	49.10	.....	107 49 32.65	+ 0.71	- 10.82	+2 46.53	
3	47 Hydræ	E	4	13 50 25.0	2 42.1	49.35	49.30	.....	99 47 7.70	+ 0.90	- 11.34	+1 52.28	-24 31 13.41
		W	...	13 56 0.0	2 52.9	51.55	51.35	.....	332 57 25.92	+ 3.11	+ 12.90	-1 52.29	
4	d Boötis	W	2.5	14 3 19.5	2 38.9	50.50	50.60	.....	22 58 34.62	+ 2.11	+ 41.74	- 13.46	+25 32 0.58
		E	...	14 8 49.8	2 51.4	49.20	49.40	.....	49 46 11.20	+ 0.81	- 48.55	+ 13.47	
5	2 Libræ	E	4	14 15 29.0	2 45.4	49.50	49.45	.....	86 34 6.35	+ 0.99	- 14.82	+1 7.73	-11 17 24.74
		W	...	14 21 4.0	2 49.6	51.60	51.50	.....	346 10 26.72	+ 3.13	+ 15.58	-1 7.73	
6	σ Boötis	W	2.5	14 31 .....	.....	51.20	51.00	26.113	27 35 26.50	+ 2.02	- 0.19	- 8.73	+30 9 1.15
		E	...	.....	.....	48.90	49.00	26.113	45 7 41.62	- 0.16	+ 0.19	+ 8.73	
7	34 Boötis	E	2.5	14 36 27.0	2 42.3	49.00	49.10	.....	48 22 44.40	+ 0.60	- 47.93	+ 12.04	+26 55 26.76
		W	...	14 41 57.8	2 48.5	51.35	51.35	.....	24 21 46.92	+ 3.03	+ 51.65	- 12.04	
8	381 G. Centauri	W	4	14 47 10.0	2 41.6	50.95	50.80	.....	324 1 0.82	+ 2.48	+ 9.70	-2 56.01	-33 28 47.56
		E	...	14 52 40.0	2 48.4	49.00	48.95	.....	108 43 38.22	+ 0.58	- 10.53	+2 55.93	
9	June 5, L. Canum Venat.	W	3	12 21 .....	.....	49.90	50.50	28.017	36 57 11.62	+ 0.33	- 0.28	+ 0.60	+39 32 12.21
		E	...	.....	.....	50.35	51.35	28.017	35 43 20.25	+ 1.00	+ 0.28	- 0.60	
10	γ Virginis (mean)	E	2.5	12 34 7.0	2 38.4	51.20	51.85	.....	76 13 27.92	+ 2.42	- 16.61	+ 46.34	- 0 56 25.12
		W	...	12 39 28.0	2 42.6	51.05	51.55	.....	356 31 3.45	+ 2.17	+ 17.50	- 46.36	
11	31 Comæ Berenices	W	2.5	12 44 30.3	2 28.4	49.65	50.40	.....	25 29 22.40	+ 0.89	+ 43.70	- 10.70	+28 2 53.48
		E	...	12 49 36.0	2 37.3	50.15	51.10	.....	47 15 19.30	+ 1.49	- 49.10	+ 10.71	
12	19 Canum Venat.	E	2.5	13 11 .....	.....	50.60	51.15	28.324	33 54 25.00	+ 2.27	+ 0.19	- 2.36	+41 20 54.94
		W	...	.....	.....	51.05	51.25	28.324	38 45 37.10	+ 2.64	- 0.19	+ 2.36	
13	α Virginis	W	2.5	13 17 23.0	2 43.4	50.35	50.90	.....	346 47 13.55	+ 1.49	+ 14.62	-1 5.38	-10 40 38.91
		E	...	13 22 45.0	2 38.6	50.15	50.80	.....	85 57 22.20	+ 1.35	- 13.77	+1 5.40	
14	ζ Virginis	E	3	13 27 9.5	2 36.5	50.25	50.85	.....	75 24 20.90	+ 1.35	- 16.50	+ 45.19	- 0 7 16.21
		W	...	13 32 29.0	2 43.0	50.95	51.30	.....	357 20 10.80	+ 1.93	+ 17.90	- 45.19	
15	δ Centauri	W	4	13 37 32.0	2 38.6	50.40	50.90	.....	324 55 0.05	+ 1.51	+ 9.48	-2 44.62	-32 34 34.02
		E	...	13 42 54.0	2 43.4	50.00	50.45	.....	107 49 31.80	+ 1.10	- 10.07	+2 44.70	
16	92 Virginis	E	3	13 49 17.0	2 15.4	50.20	50.50	.....	73 46 45.88	+ 1.18	- 12.80	+ 42.67	+ 1 30 17.59
		W	...	13 54 9.0	2 36.6	51.20	51.55	.....	358 57 42.30	+ 2.30	+ 17.12	- 42.69	
17	d Boötis	E	2.5	14 2 32.5	3 25.9	50.00	50.45	.....	49 46 30.32	+ 1.03	-1 10.05	+ 13.33	+25 31 59.28
		W	...	14 8 50.0	2 51.6	51.10	51.45	.....	22 58 22.65	+ 2.11	+ 48.67	- 13.32	
18	2 Libræ	W	3	14 15 21.0	2 53.4	50.30	50.65	.....	346 10 26.85	+ 1.29	+ 16.28	-1 7.03	-11 17 25.33
		E	...	14 20 41.0	2 26.6	49.35	50.00	.....	86 34 5.30	+ 0.44	- 11.64	+1 7.03	
19	σ Boötis	E	...	14 31 .....	.....	49.70	50.05	26.113	45 7 39.00	+ 1.48	+ 0.19	+ 8.64	+30 9 0.97
		W	...	.....	.....	51.05	51.45	26.113	27 35 24.12	+ 2.88	- 0.19	- 8.64	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
1 11 24.5	60.9	...	...	6.9. Instrument in meridian, observation at IX with movable thread.	1	36 22 20.80	+ 0.97
11 30	59.9	...	...	12. Instrument in meridian, observation at II with movable thread.	2	19.24	+ 10.27
11 37.5	58.0	...	...	19. Instrument in meridian, observation at I with movable thread.	3	19.59	+ 7.96
11 41	58.6	...	...		4	20.97	...
11 50.5	58.6	...	...		5	18.98	+ 4.12
11 50	58.6	...	...		6	20.01	- 4.92
14 9	57.9	60.0	29.668		7	19.14	- 4.16
14 16.5	58.1	...	...		8	20.12	+ 6.43
14 21	58.1	...	...		9	19.40	- 8.83
14 31	57.7	...	...		10	18.43	...
14 42	57.5	...	...		11	19.14	...
14 47.5	57.1	...	...		12	18.84	- 9.07
14 51	57.6	59.0	29.673		13	19.73	...
5 12 21.5	60.7	...	...		14	18.19	...
12 11	60.9	66.7	29.568		15	16.98	+ 10.34
12 47	64.1	...	...		16	17.98	+ 1.61
13 15	61.6	...	...	9-19. Gusty winds.	17	17.37	...
13 22	63.4	...	...	16 W. One microscope reading increased to".	18	19.26	+ 4.02
13 32	61.6	...	...	18. 19. Clouds.	19	18.78	- 5.47
13 32.5	61.1	...	...		
13 43	61.1	64.2	29.590				
13 54	62.9	...	...		
14 5	62.1	...	...		
14 15	62.6	...	...		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	α Libræ	W	3.5	14 42 44.0	2 49.1	50.00	50.25	.....	341 48 42.22	+ 0.95	+14.31	-1 18.52	-15 39 23.36
	June 6, L.	E	...	14 48 12.0	2 38.9	49.35	49.90	.....	90 55 52.40	+ 0.51	-12.60	+1 18.54	
2	γ Ursæ Majoris	E	3	12 34 31.0	2 47.9	49.80	50.20	.....	12 4 7.80	+ 1.39	+13.09	- 25.10	+63 13 39.18
		W	...	12 40 10.0	2 51.1	50.55	50.95	.....	60 40 28.75	+ 2.18	-13.59	+ 25.12	
3	ψ Virginis	W	3.5	12 46 31.0	2 48.6	50.15	50.65	.....	348 25 39.30	+ 1.90	+16.04	-1 1.65	- 9 2 7.00
		E	...	12 52 3.0	2 43.4	49.60	50.20	.....	84 18 54.72	+ 1.34	-15.07	+1 1.67	
4	β Cassiopeiæ s. p.	E	4	13 21 14.0	2 50.4	49.20	49.60	.....	325 7 20.68	+ 0.85	- 4.50	-2 42.77	+69 46 57.87
		W	...	13 26 32.0	2 27.6	51.65	51.70	.....	107 37 16.00	+ 3.19	+ 3.37	+2 42.88	
5	η Ursæ Majoris	W	3	13 41 3.0	2 38.6	51.15	51.50	.....	47 14 14.20	+ 2.76	-36.57	+ 10.74	+49 46 48.90
		E	...	13 46 35.0	2 53.4	49.00	49.40	.....	25 30 12.90	+ 0.57	+43.70	- 10.75	
6	π Boötis	E	3	13 54 16.5	2 29.9	48.65	49.05	.....	47 27 54.18	+ 0.33	-43.83	+ 10.98	+27 50 13.75
		W	...	13 59 20.5	2 34.1	51.20	51.50	.....	25 16 37.95	+ 2.80	+46.32	- 10.99	
7	λ Virginis	W	3.5	14 11 7.0	2 46.6	49.50	49.65	.....	344 31 20.60	+ 1.04	+14.59	-1 11.29	-12 56 38.92
		E	...	14 16 38.0	2 44.4	50.65	51.00	.....	88 13 16.42	+ 2.31	-14.20	+1 11.32	
8	γ Boötis	E	3	14 28 ....	.....	50.65	51.00	27.377	36 32 57.00	+ 2.57	+ 0.04	+ 0.20	+38 43 0.12
		W	...	.....	.....	49.70	50.00	27.377	36 8 25.50	+ 1.84	- 0.17	- 0.20	
9	β Boötis	W	3	14 36 32.5	2 36.8	49.00	49.15	.....	24 21 58.10	+ 0.44	+44.74	- 11.94	+26 55 27.00
		E	3.5	14 41 49.0	2 39.7	51.05	51.40	.....	48 22 42.20	+ 2.69	-46.40	+ 11.94	
10	δ G. Centauri	E	4	14 47 8.0	2 43.6	51.45	51.55	.....	108 43 36.58	+ 3.03	- 9.94	+2 54.55	-33 28 47.35
	June 8, L.	W	...	14 52 28.0	2 36.4	49.95	50.00	.....	324 1 0.58	+ 1.43	+ 9.08	-2 54.65	
11	Groombridge 2066	W	2.5	13 0 30.0	2 59.0	50.65	51.00	.....	85 35 8.25	+ 1.89	- 0.58	+1 5.27	+88 9 12.60
		E	...	13 5 20.0	1 51.0	50.10	50.45	.....	347 9 26.45	+ 1.36	+ 0.22	-1 5.31	
12	σ Virginis	E	3	13 9 53.5	2 49.8	50.50	50.55	.....	69 19 43.88	+ 1.62	-22.37	+ 36.58	+ 5 57 35.70
		W	...	13 15 21.0	2 37.7	50.95	50.65	.....	3 24 53.45	+ 1.86	+19.30	- 36.58	
13	β Cassiopeiæ s. p.	W	3	13 21 20.0	2 44.6	50.85	50.80	.....	107 37 15.08	+ 1.90	+ 4.20	+2 44.62	+69 46 56.98
		E	...	13 26 40.0	2 35.4	49.80	49.75	.....	325 7 20.38	+ 0.83	- 3.74	-2 44.63	
14	γ B. Ursæ Minoris	E	2.5	13 32 5.0	2 41.6	49.45	49.75	.....	3 34 56.48	+ 0.62	+ 6.41	- 36.35	+71 43 8.78
		W	...	13 37 36.0	2 49.4	50.75	50.95	.....	69 9 40.38	+ 1.95	- 7.05	+ 36.36	
15	η Virginis	W	3	13 48 45.0	2 47.5	50.35	50.30	.....	358 57 43.02	+ 1.42	+19.59	- 43.22	+ 1 30 17.76
		E	...	13 54 17.0	2 44.5	50.40	50.50	.....	73 46 52.52	+ 1.50	-18.89	+ 43.24	
16	θ H. Boötis	E	3	14 4 ....	.....	50.45	50.60	28.335	30 57 25.60	+ 2.18	+ 0.21	- 5.33	+44 17 57.22
		W	...	.....	.....	50.75	50.85	28.335	41 42 36.50	+ 2.41	- 0.21	+ 5.33	
17	λ Virginis	E	3.5	14 11 8.5	2 45.2	50.40	50.60	.....	88 13 16.32	+ 1.56	-14.34	+1 12.02	-12 56 39.55
		W	...	14 16 32.0	2 38.3	50.65	50.60	.....	344 31 20.52	+ 1.71	+13.17	-1 12.02	
18	α B. Boötis	W	2.5	14 26 ....	.....	50.05	50.15	25.913	39 39 26.35	+ 0.60	- 0.19	+ 3.26	+42 13 3.82
		E	...	.....	.....	49.95	50.20	25.913	33 3 58.05	+ 0.47	+ 0.19	- 3.26	
19	ϵ Centauri	E	4	14 35 4.0	2 43.5	50.25	50.55	.....	110 1 6.08	+ 1.45	- 9.71	+3 10.62	-34 46 32.50
		W	...	14 40 34.0	2 46.5	50.25	50.20	.....	322 43 29.52	+ 1.30	+10.07	-3 10.52	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.					No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>							<i>° ' "</i>	<i>"</i>
5 14 31	61.9	.....	.....	8. Instrument in meridian; E. observation at III; W. observation at II with movable thread.					1	36 22 18.89	.....
14 49	61.6	62.8	29.618	16. Instrument in meridian, observation at II with movable thread.					2	19.82	.....
6 12 38	66.6	68.0	29.696	18. Instrument in meridian, observation at VIII with movable thread.					3	19.12	+ 6.04
12 52	65.9	.....	.....						4	19.85	.....
13 21.5	65.2	.....	.....						5	18.78	.....
13 27	64.9	.....	.....						6	18.87	.....
13 47	64.1	65.9	29.733						7	20.40	.....
14 0	63.5	.....	.....						8	20.05	.....
14 17	62.9	.....	.....						9	20.88	- 4.82
14 40	62.9	.....	.....						10	20.33	+ 6.61
14 47.5	62.6	.....	.....						11	18.78	-17.06
14 53	62.3	64.2	29.746						12	18.87	+ 0.69
8 13 1	60.7	63.3	29.751						13	19.32	.....
13 10	60.1	.....	.....						14	19.40	-14.02
13 21.5	60.2	.....	.....	Notes.					15	19.59	+ 1.30
13 27	60.2	.....	.....	1. Gusty winds.					16	19.12	- 9.51
13 36	60.1	.....	.....	4, 8, 11, 18. Very faint.					17	19.47	.....
13 52	59.2	.....	.....	5, 7. Clouds.					18	19.60	- 8.60
13 59	.....	60.9	29.758						19	19.40	+ 7.66
14 4	58.4	.....	.....						
14 14	58.3	.....	.....						
14 26	58.5	.....	.....						

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	♏ ¹ Libræ	W	3.5	14 46 26.0	2 43.1	49.85	49.95	.....	345 56 44.00	+ 0.93	+14.34	-1 8.53	-11 31 11.20
	June 15, L.	E	...	14 51 50.0	2 40.9	50.05	50.15	.....	86 47 50.38	+ 1.20	-13.96	+1 8.61	
2	γ Hydræ	W	3	13 11 2.0	2 39.1	48.55	49.75	.....	334 47 30.42	+ 0.26	+11.27	-1 41.27	-22 41 0.44
		E	...	13 16 20.0	2 38.9	49.05	51.00	.....	97 57 3.12	+ 1.43	-11.24	+1 41.33	
3	13 B. Ursæ Minoris	W	2	13 32 7.0	2 39.5	49.60	50.70	.....	69 9 42.12	+ 1.30	- 6.25	+ 35.49	+71 43 10.50
		E	...	13 37 28.0	2 41.5	49.35	50.50	.....	3 34 52.82	+ 1.01	+ 6.41	- 35.50	
4	h Centauri	E	3.5	13 44 48.0	2 52.7	49.60	50.60	.....	106 43 29.02	+ 1.23	-11.46	+2 33.17	-31 28 15.84
		W	4	13 50 25.0	2 44.3	49.85	50.65	.....	326 1 8.75	+ 1.36	+10.37	-2 33.27	
5	9 H. Boötis	W	2	14 4 ....	.....	48.95	50.00	28.423	41 42 36.40	+ 0.52	0.00	+ 5.20	+44 17 58.64
		E	...	.....	.....	49.25	50.50	28.423	30 57 22.52	+ 0.27	+ 0.32	- 5.20	
6	ε Boötis	E	2	14 10 10.0	2 31.9	49.30	50.50	.....	23 29 22.88	+ 1.02	+27.15	- 12.64	+51 47 57.56
		W	...	14 15 10.0	2 34.1	49.55	50.55	.....	49 15 14.58	+ 1.17	-27.95	+ 12.64	
7	204 B. Boötis	E	2.5	14 26 ....	.....	49.40	50.50	25.864	33 3 57.90	+ 1.71	+ 0.30	- 3.18	+42 13 4.61
		W	...	.....	.....	49.70	50.60	25.864	39 39 27.98	+ 2.01	- 0.30	+ 3.18	
8	α ¹ Centauri	W	4	14 35 12.0	2 35.8	49.05	50.05	.....	322 43 26.75	+ 0.66	+ 8.81	-3 5.90	-34 46 32.82
		E	...	14 40 42.0	2 54.2	49.50	50.70	.....	110 1 12.70	+ 1.20	-11.02	+3 6.16	
9	♏ ¹ Libræ	E	3	14 46 25.0	2 44.4	49.80	50.75	.....	86 47 52.38	+ 1.29	-14.57	+1 6.88	-11 31 11.54
		W	...	14 51 45.0	2 35.6	49.75	50.85	.....	345 56 42.32	+ 1.38	+13.05	-1 6.93	
10	φ Boötis	W	2.5	14 57 46.5	2 30.7	49.40	50.00	.....	24 45 13.88	+ 0.80	+42.54	- 11.39	+27 18 42.56
		E	...	15 2 44.0	2 26.8	49.50	50.35	.....	47 59 21.70	+ 1.05	-40.36	+ 11.40	
11	β Libræ	E	3.5	15 9 7.0	2 42.7	49.55	50.65	.....	84 19 11.62	+ 1.20	-14.94	+1 1.45	- 9 2 24.49
		W	...	15 14 32.0	2 42.3	50.00	51.00	.....	348 25 22.22	+ 1.64	+14.87	-1 1.46	
12	32 Libræ	W	3.5	15 20 3.0	2 47.4	49.60	50.60	.....	341 4 32.58	+ 1.17	+13.88	-1 19.91	-16 23 34.68
		E	...	15 25 26.0	2 35.6	49.55	50.45	.....	91 40 1.22	+ 1.02	-11.98	+1 19.91	
13	κ Libræ	E	4	15 33 41.0	2 44.0	49.90	50.70	.....	94 38 58.05	+ 1.41	-12.66	+1 29.49	-19 22 41.76
	June 17, L.	W	...	15 39 2.0	2 37.0	50.90	51.45	.....	338 5 35.20	+ 2.34	+11.60	-1 29.44	
14	23 Canum Venat.	E	2.5	13 16 ....	.....	49.20	50.30	25.787	34 38 35.80	+ 1.46	+ 0.19	- 1.66	+40 38 28.44
		W	...	.....	.....	50.50	51.80	25.787	38 4 55.22	+ 2.91	- 0.19	+ 1.66	
15	81 Ursæ Majoris	W	2.5	13 27 45.0	2 37.2	49.85	50.70	.....	53 16 47.10	+ 1.43	-20.25	+ 16.83	+55 49 43.90
		E	...	13 32 51.0	2 28.8	48.65	49.55	.....	19 27 48.78	+ 0.30	+18.14	- 16.83	
16	7 Ursæ Majoris	E	2	13 41 14.0	2 27.9	49.00	49.90	.....	25 30 24.42	+ 0.57	+31.81	- 10.63	+49 46 49.87
		W	...	13 46 25.0	2 43.1	50.65	51.70	.....	47 14 18.55	+ 2.32	-38.68	+ 10.64	
17	11 Boötis	W	3	13 54 15.0	2 31.8	50.35	51.15	.....	25 16 41.05	+ 1.91	+44.96	- 10.87	+27 50 14.78
		E	...	13 59 21.0	2 34.2	48.55	49.70	.....	47 27 55.88	+ 0.20	-46.38	+ 10.87	
18	ε Boötis	W	3	14 10 10.5	2 31.5	50.45	51.50	.....	49 15 11.75	+ 2.18	-27.02	+ 12.69	+51 47 57.60
		E	...	14 15 11.0	2 29.0	48.55	49.60	.....	23 29 23.82	+ 0.24	+26.13	- 12.70	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>						<i>° ' "</i>	<i>"</i>
8 14 35.5	58.3	...	...	5 E. Instrument in meridian, observation at IX with movable thread.				1	36 22 18.48	+ 2.83
14 41	58.6	...	...	7 Instrument in meridian, observation at I with movable thread.				2	17.06	.....
14 50	57.6	60.0	29.793	14. Instrument in meridian, observation at II with movable thread.				3	18.70	-16.84
15 11 11.5	72.5	...	...					4	19.58	+10.22
11 17	72.2	73.7	29.726					5	19.18	-10.69
13 23	72.0	...	...					6	19.42	-12.03
13 35	71.6	...	...					7	19.69	- 9.90
13 45	71.1	...	...					8	19.68	+ 8.30
13 50.5	70.8	...	...					9	17.90	+ 2.70
14 5	71.1	...	...					10	19.81	.....
14 13	70.8	...	...					11	18.30	.....
14 26	71.0	72.5	29.751					12	18.94	.....
14 35.5	70.5	...	...					13	18.00	.....
14 41	69.8	...	...					14	19.47	-10.48
14 46.5	70.2	...	...					15	17.75	-13.80
15 1	69.5	...	...					16	19.50	.....
15 13	68.7	...	...					17	18.81	.....
15 23	69.1	...	...	7.14. Very faint.				18	18.54	-12.38
15 34	69.1	...	...	14-18. Hazy.						
15 39	69.4	70.7	29.776	17. Very faint; poor observation.						
17 11 16	75.8	...	...					
13 10	75.5	...	...					
13 38	...	76.8	30.082							
13 45	75.1	...	...					
13 58	74.8	...	...					

No.	Date, observer, and object.	Circle.	See-ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	<i>g</i> Boötis	E	2.5	14 22 40.0	2 33.4	48.70	49.45	.....	25 1 24.08	+ 0.25	+32.45	- 11.14	+50 15 50.00
		W	...	14 28 14.5	3 1.1	51.05	52.00	.....	47 43 23.88	+ 2.75	-45.22	+ 11.15	
2	π Boötis	W	2.5	14 33 19.5	2 51.4	50.90	51.55	.....	14 15 56.90	+ 2.48	+31.71	- 22.56	+16 49 5.45
		E	...	14 38 47.5	2 36.6	48.50	49.50	.....	58 28 34.50	+ 0.12	-26.48	+ 22.57	
3	321 B. Boötis	E	3	14 49 11.0	2 28.4	49.10	49.70	.....	60 28 9.02	+ 0.50	-22.13	+ 24.86	+14 49 22.60
		W	...	14 54 3.5	2 24.1	51.65	52.55	.....	12 16 25.10	+ 3.28	+20.86	- 24.87	
4	ϕ Boötis	E	2.5	14 57 46.0	2 31.2	48.70	49.55	.....	47 59 23.40	+ 0.29	-42.81	+ 11.44	+27 18 43.10
		W	...	15 2 50.5	2 33.3	51.40	52.50	.....	24 45 9.70	+ 3.17	+44.02	- 11.44	
5	β Libræ	W	2.5	15 9 6.0	2 43.8	49.80	50.55	.....	348 25 23.60	+ 1.37	+15.14	-1 1.60	- 9 2 24.52
		E	...	15 14 28.0	2 38.2	49.95	50.95	.....	84 19 11.50	+ 1.64	-14.13	+1 1.63	
6	ϵ Draconis	E	2.5	15 20 3.0	2 38.9	50.35	51.00	.....	16 0 0.65	+ 1.80	+15.71	- 20.68	+59 17 39.34
		W	...	15 25 27.0	2 45.1	50.40	50.80	.....	56 44 37.60	+ 1.76	-16.96	+ 20.68	
7	κ Libræ	W	3.5	15 33 37.0	2 48.1	49.80	50.45	.....	338 5 34.95	+ 1.33	+13.29	-1 29.92	-19 22 41.68
		E	...	15 39 2.0	2 36.9	50.00	50.85	.....	94 38 56.12	+ 1.60	-11.59	+1 29.97	
8	π Scorpii	E	3.5	15 50 10.0	2 53.5	50.30	51.05	.....	101 6 37.75	+ 1.84	-12.71	+1 57.76	-25 50 50.08
		W	...	15 55 46.0	2 42.5	50.40	51.10	.....	331 37 56.00	+ 1.99	+11.15	-1 57.73	
9	June 20, L. 17 H. Canum Venat.	W	2	13 31 ....	.....	48.75	50.20	25.544	35 6 23.62	- 0.33	- 0.26	- 1.20	+37 39 41.32
		E	...	.....	.....	49.30	50.80	25.544	37 37 30.50	+ 0.32	+ 0.26	+ 1.20	
10	83 Virginis	E	3	13 36 32.0	2 46.1	49.90	51.10	.....	90 59 16.82	+ 1.51	-13.82	+1 17.05	-15 42 47.56
		W	...	13 42 2.0	2 43.9	48.95	50.05	.....	341 45 16.50	+ 0.48	+13.46	-1 17.09	
11	11 Boötis	W	2.5	13 54 5.0	2 41.9	48.50	49.55	.....	25 16 37.40	- 0.05	+51.13	- 10.76	+27 50 16.37
		E	...	13 59 34.5	2 47.6	49.55	50.90	.....	47 28 0.95	+ 1.15	-54.80	+ 10.76	
12	α Boötis	E	2.5	14 8 31.0	2 43.6	50.05	51.15	.....	55 37 41.62	+ 1.63	-32.42	+ 19.20	+19 40 3.80
		W	...	14 14 1.5	2 46.9	49.35	50.55	.....	17 6 49.08	+ 0.92	+33.75	- 19.20	
13	<i>g</i> Boötis	W	2	14 22 36.5	2 37.0	48.95	50.05	.....	47 43 14.80	+ 0.48	-33.99	+ 11.03	+50 15 50.48
		E	...	14 28 6.0	2 52.5	49.40	50.65	.....	25 1 13.45	+ 1.02	+41.02	- 11.04	
14	295 B. Boötis	E	2.5	14 45 ....	.....	49.55	50.75	27.038	37 4 22.82	+ 1.68	+ 0.17	+ 0.70	+38 11 47.29
		W	...	.....	.....	49.75	50.65	27.038	35 37 25.95	+ 1.79	- 0.17	- 0.70	
15	ξ^2 Libræ	W	3.5	14 49 22.0	2 11.0	49.05	50.20	.....	346 25 50.78	+ 0.64	+ 9.34	-1 5.29	-11 2 6.27
		E	...	14 54 11.0	2 38.0	49.20	50.40	.....	86 18 48.60	+ 0.76	-13.58	+1 5.31	
16	<i>c</i> Boötis	E	2.5	15 0 28.0	2 34.7	49.60	50.90	.....	50 3 59.28	+ 1.18	-38.81	+ 13.41	+25 13 58.43
		W	...	15 5 30.5	2 27.8	49.80	51.00	.....	22 40 35.48	+ 1.36	+35.42	- 13.42	
17	32 Libræ	E	3	15 20 11.0	2 39.6	49.80	51.05	.....	91 40 1.42	+ 1.36	-12.61	+1 19.36	-16 23 34.84
		W	...	15 25 31.0	2 40.4	50.10	51.05	.....	341 4 31.85	+ 1.55	+12.74	-1 19.36	
18	ζ Coronæ Borealis	W	2.5	15 36 ....	.....	49.55	50.75	26.576	34 22 24.68	+ 0.37	- 0.25	- 1.90	+36 56 23.34
		E	...	.....	.....	49.45	50.85	26.576	38 20 6.78	+ 0.36	+ 0.25	+ 1.90	
19	λ Libræ	E	3.5	15 45 0.0	2 46.1	49.50	50.70	.....	95 9 40.18	+ 1.11	-12.87	+1 30.71	-19 53 23.67
		W	...	15 50 11.0	2 24.9	49.60	50.85	.....	337 34 58.40	+ 1.21	+ 9.80	-1 30.70	

Time.	Ther. 382.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m s</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
17 14 14	74.4	.....	.....	9.18. Instrument in meridian, observation at IX with movable thread.	1	36 22 19.10	-11.84
14 26	73.9	.....	.....	14. Instrument in meridian, observation at II with movable thread.	2	19.62	- 4.22
14 36	73.5	.....	.....		3	18.31	.....
14 44	.....	75.5	30.084		4	18.88	.....
14 52	73.2	.....	.....		5	19.58	.....
15 3	73.1	.....	.....		6	20.28	.....
15 12	72.8	.....	.....		7	17.88	.....
15 23	72.4	.....	.....		8	18.02	+ 2.56
15 34	71.8	.....	.....		9	18.86	.....
15 39.5	71.5	.....	.....		10	17.46	+ 6.08
15 51	70.8	73.5	30.081		11	17.89	.....
15 56	71.0	.....	.....		12	17.29	-12.46
20 13 31	76.1	.....	.....		13	18.38	.....
13 40	75.8	77.8	29.838		14	18.93	- 9.73
13 57	75.5	.....	.....	Notes.	15	18.28	.....
14 12	75.1	.....	.....	1-8. Hazy.	16	16.95	- 6.73
14 25	74.9	.....	.....	7-14. Very faint; poor observation.	17	18.16	.....
14 45	74.5	76.4	29.838	19. Clouds.	18	20.04	- 8.55
14 53	74.7	.....	.....		19	18.92	.....
15 4	74.4	.....	.....		
15 23	73.7	.....	.....		
15 36	73.8	75.3	29.843				
15 45	73.5	.....	.....		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	θ Draconis	W E	2.5 ...	15 57 26.0 16 2 47.0	2 33.3 2 47.7	49.25 49.20	50.65 50.70	.....	56 15 54.28 16 28 36.92	+ 0.86 + 0.90	-15.17 +18.16	+ 19.95 - 19.95	+58 48 58.48
2	ε Coronæ Borealis	E W	2.5 ...	16 18 .....	.....	49.55 49.80	50.75 50.70	27.770 27.770	44 8 50.48 28 31 48.38	+ 1.71 + 1.85	+ 0.13 - 0.13	+ 7.57 - 7.57	+31 6 33.36
	June 21, L.												
3	η Boötis	W E	2.5 ...	13 47 20.5 13 52 47.0	2 44.2 2 42.3	48.50 49.25	50.05 50.90	.....	16 18 44.82 56 25 51.10	+ 0.16 + 1.04	+31.56 -30.84	- 20.00 + 20.00	+18 51 54.16
4	π Hydræ	E W	3 ...	13 58 1.0 14 3 33.0	2 53.1 2 38.9	49.55 49.35	51.35 50.80	.....	101 30 0.15 331 14 36.55	+ 1.32 + 0.98	-12.57 +10.59	+1 57.60 -1 57.69	-26 14 11.50
5	α Boötis	W E	2.5 ...	14 8 27.0 14 13 56.5	2 47.6 2 41.9	49.00 49.35	50.35 50.95	.....	17 6 51.58 55 37 43.18	+ 0.59 + 1.11	+34.03 -31.76	- 19.17 + 19.17	+19 40 4.20
6	θ Boötis	E W	2.5 ...	14 19 16.5 14 24 25.0	2 35.0 2 33.5	49.40 49.90	51.00 51.35	.....	23 0 19.35 49 44 15.62	+ 1.10 + 1.52	+26.98 -26.46	- 13.04 + 13.04	+52 17 1.20
7	6 B. Libræ	W E	3.5 ...	14 29 10.0 14 34 35.0	2 42.6 2 42.4	49.70 49.35	51.15 50.80	.....	345 33 14.42 87 11 20.02	+ 1.37 + 1.02	+14.16 -14.13	-1 7.25 +1 7.27	-11 54 39.20
8	μ Libræ	E W	3 ...	14 41 30.0 14 46 24.0	2 32.9 2 21.1	49.55 50.30	50.90 51.55	.....	89 2 20.15 343 42 17.08	+ 1.12 + 1.84	-12.11 +10.32	+1 11.89 -1 11.91	-13 45 45.32
9	321 B. Boötis	W E	3 ...	14 49 27.0 14 54 15.0	2 12.4 2 35.6	50.10 49.45	51.40 50.65	.....	12 16 29.80 60 28 10.28	+ 1.67 + 0.93	+17.62 -24.32	- 24.58 + 24.59	+14 49 23.06
10	ε Boötis	W E	3 ...	15 0 27.0 15 5 39.5	2 35.7 2 36.8	50.30 49.70	51.55 50.80	.....	22 40 32.22 50 4 1.38	+ 1.85 + 1.13	+30.30 -39.86	- 13.41 + 13.41	+25 13 58.49
11	ε Draconis	W E	2.5 ...	15 20 15.0 15 25 24.0	2 26.9 2 42.1	50.80 49.40	52.00 50.45	.....	56 44 33.25 15 59 56.45	+ 2.33 + 0.90	-13.43 +16.35	+ 20.44 - 20.44	+59 17 41.20
12	ζ Coronæ Borealis	E W	2.5 ...	15 36 .....	.....	49.35 50.70	50.20 51.95	26.540 26.540	38 20 6.58 34 22 22.72	+ 1.38 + 2.97	+ 0.25 - 0.25	+ 1.90 - 1.90	+36 56 23.26
13	λ Libræ	W E	3 ...	15 44 55.0 15 50 23.0	2 51.1 2 36.9	50.40 49.35	51.65 50.70	.....	337 34 55.12 95 9 38.28	+ 1.97 + 0.99	+13.66 -11.48	-1 30.66 +1 30.63	-19 53 22.62
14	ω ² Scorpii	E W	3 ...	15 59 7.0 16 4 20.0	2 40.1 2 32.9	49.60 50.90	50.65 52.00	.....	95 53 16.70 336 51 16.28	+ 1.07 + 2.43	-11.81 +10.77	+1 33.32 -1 33.31	-20 37 5.02
15	ε Coronæ Borealis	W E	2.5 ...	16 18 .....	.....	50.15 49.30	51.50 50.50	27.837 27.837	28 31 47.30 44 8 57.82	+ 1.09 + 0.08	- 0.20 + 0.20	- 7.57 + 7.57	+31 6 34.02
	June 24, L.												
16	γ Boötis	E W	2.5 3	13 47 22.5 13 52 46.5	2 42.5 2 41.5	49.65 50.15	51.10 51.50	.....	56 25 48.70 16 18 42.75	+ 1.28 + 1.68	-30.91 +30.54	+ 19.85 - 19.88	+18 51 54.62
17	π Hydræ	W E	4 ...	13 58 14.0 14 3 33.0	2 40.4 2 38.6	49.65 49.15	51.10 50.65	.....	331 14 32.38 101 29 58.75	+ 1.21 + 0.69	+10.79 -10.55	-1 56.86 +1 56.88	-26 14 12.58
18	θ Boötis	W E	2.5 ...	14 19 17.0 14 24 41.5	2 34.8 2 49.7	50.05 49.10	51.55 50.75	.....	49 44 15.35 23 0 13.10	+ 1.63 + 0.73	-26.91 +32.33	+ 12.95 - 12.95	+52 17 1.44

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
20 15 50.5	73.5	...	...	12 Instrument in meridian, observation at II with movable thread.	1	36 22 17.98	...
16 0	73.5	...	...	12 Instrument in meridian, observation at I with movable thread.	2	18.42	-6.73
16 18	73.0	75.3	29.848	15 Instrument in meridian, observation at IX with movable thread.	3	18.92	...
21 13 47.5	78.6	...	...		4	18.46	...
13 53	78.6	No. 3	29.956		5	19.36	...
13 58	78.3	...	...		6	19.06	...
14 4	77.9	...	...		7	18.44	+3.12
14 11	77.9	...	...		8	19.19	+3.18
14 22	78.1	...	...		9	18.00	...
14 32	77.6	...	...		10	18.01	-0.95
14 44	77.2	...	...		11	17.92	...
14 52	77.0	...	...		12	19.30	-8.80
15 1	76.8	79.0	29.971*		13	19.26	...
15 23	76.6	...	...		14	17.72	+1.33
15 36	76.5	...	...		15	18.58	-7.00
15 45	76.9	...	...	Notes.	16	17.00	...
15 50.5	76.1	...	...	2, 10, 17. Very faint, clouds or haze.	17	16.64	...
15 59.5	75.8	...	...	7. Very faint	18	18.12	...
16 5	75.9	...	...	Barometer reading increased from 29.921 to 29.971 in.			
16 19	75.5	76.9	29.975*	Barometer reading increased from 29.925 to 29.975 in.			
24 11 51	80.3	...	...		
13 58.5	79.6	...	...		
14 4	79.5	81.1	29.846				
14 22	79.6	...	...		

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>' "</i>	<i>' "</i>	<i>° ' "</i>
1	π Boötis	E W	3 ...	14 33 33.0 14 38 41.0	2 38.2 2 29.8	49.35 50.60	50.85 52.00	..... .....	58 28 30.05 14 16 3.10	+ 0.93 + 2.12	- 27.02 + 24.23	+ 22.13 - 22.14	+16 49 7.15
2	α Libræ	E W	3.5 ...	14 42 53.0 14 48 17.0	2 41.0 2 43.0	49.15 50.45	50.50 51.75	..... .....	90 55 53.65 341 48 38.88	+ 0.61 + 1.95	- 13.00 + 13.32	+1 16.38 -1 16.38	-15 39 23.40
3	i Boötis (<i>n. fol.</i>)	W E	3 ...	15 1 ..... .....	..... .....	49.90 48.85	51.50 50.45	25.925 25.925	45 27 25.60 27 15 55.52	+ 1.01 - 0.05	- 0.24 + 0.24	+ 8.74 - 8.74	+48 1 10.61
4	μ Boötis	E W	2.5 ...	15 21 ..... .....	..... .....	49.30 50.45	50.80 51.65	27.650 27.650	37 33 24.22 35 7 31.65	+ 1.49 + 2.53	+ 0.17 - 0.17	+ 1.16 - 1.16	+37 42 19.44
5	γ Libræ	W E	3 ...	15 27 49.0 15 32 46.0	2 20.6 2 36.4	50.05 48.90	51.45 50.45	..... .....	342 59 14.95 89 45 22.32	+ 1.63 + 0.53	+ 10.12 - 12.52	-1 13.42 +1 13.45	-14 28 48.71
6	ϵ Serpentis	E W	2.5 ...	15 43 13.0 15 51 25.5	2 47.9 5 24.6	49.45 50.85	50.75 52.05	..... .....	70 31 48.62 2 11 47.32	+ 1.00 + 2.32	- 21.23 +1 19.34	+ 37.12 - 37.12	+ 4 45 29.72
7	γ Herculis	E W	3 ...	16 15 11.0 16 20 15.8	2 28.3 2 36.5	49.50 51.55	50.75 53.05	..... .....	55 55 16.35 16 49 7.62	+ 0.99 + 3.21	- 26.31 + 29.30	+ 19.45 - 19.45	+19 22 21.64
8	β Herculis	W E	2.5 3.5	16 23 35.0 16 29 14.0	2 28.6 3 10.4	51.35 49.50	52.95 50.95	..... .....	19 8 22.25 53 36 26.50	+ 3.02 + 1.04	+ 20.40 - 48.24	- 17.00 + 17.01	+21 41 37.22
9	June 26, L. π Hydræ	W E	3.5 4	13 58 16.0 14 3 40.0	2 38.5 2 45.5	50.65 51.05	51.55 52.40	..... .....	331 14 33.60 101 29 58.02	+ 0.08 + 0.68	+ 10.53 - 11.49	-1 56.27 +1 56.33	-26 14 11.26
10	June 27, L. 6 B. Libræ	E W	3 ...	14 29 21.0 14 34 41.0	2 32.0 2 48.0	48.00 49.05	49.00 50.00	..... .....	87 11 16.15 345 33 11.45	+ 1.15 + 2.18	- 12.38 + 15.12	+1 7.41 -1 7.42	-11 54 38.96
11	295 B. Boötis	W E	3 ...	14 45 ..... .....	..... .....	48.90 47.40	49.70 48.40	26.737 26.737	35 37 38.92 37 4 34.42	+ 1.85 - 0.24	- 0.01 + 0.26	- 0.70 + 0.70	+38 11 49.00
12	ξ^2 Libræ	E W	3 ...	14 50 12.0 14 54 28.0	1 21.4 2 54.6	47.55 48.95	48.45 49.80	..... .....	86 18 37.50 346 25 42.18	+ 0.59 + 2.06	- 3.61 + 16.59	+1 5.40 -1 5.43	-11 2 5.70
13	μ Boötis	W E	3 ...	15 21 ..... .....	..... .....	48.15 47.50	49.00 48.60	27.772 27.772	35 7 31.10 37 33 20.45	+ 0.66 + 0.10	- 0.17 + 0.17	- 1.18 + 1.18	+37 42 20.80
14	3 H. Scorpïi	E W	3 ...	15 28 20.0 15 33 51.0	2 53.2 2 37.8	48.30 48.55	49.50 49.45	..... .....	103 5 19.85 329 39 15.10	+ 1.55 + 1.66	- 12.25 + 10.17	+2 7.89 -2 7.94	-27 49 42.48
15	ϵ Serpentis	W E	3 ...	15 43 11.0 15 48 45.0	2 50.1 2 43.9	48.25 47.85	49.20 48.50	..... .....	2 12 47.05 70 31 47.40	+ 1.34 + 0.83	+ 21.79 - 20.23	- 37.56 + 37.55	+ 4 45 30.08
16	ω^2 Scorpïi	W E	3 ...	15 59 9.0 16 4 33.0	2 38.6 2 45.4	48.65 47.55	49.50 48.60	..... .....	336 51 17.50 95 53 18.60	+ 1.73 + 0.71	+ 11.59 - 12.61	-1 33.75 +1 33.77	-20 37 5.16
17	σ Scorpïi	E W	3 ...	16 12 31.0 16 18 1.0	2 51.8 2 38.2	47.80 48.85	48.55 49.80	..... .....	100 38 4.52 332 6 29.98	+ 0.74 + 1.95	- 12.56 + 10.65	+1 54.33 -1 54.30	-25 22 12.84
18	τ Scorpïi	W E	3 ...	16 27 20.0 16 32 38.0	2 36.3 2 41.7	48.55 47.65	49.25 48.15	..... .....	329 27 33.65 103 17 0.60	+ 1.56 + 0.51	+ 9.94 - 10.65	-2 9.18 +2 9.10	-28 1 25.26

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>			<i>° ' "</i>	<i>"</i>
24 14 37	79.3	...	...	3, 13. Instrument in meridian, observation at VIII with movable thread.	1	36 22 10.70	- 5.26
14 46	79.5	...	...	4. Instrument in meridian, observation at II with movable thread.	2	17.70	...
15 1	78.7	...	...	11. Instrument in meridian; W. observation at VI; E. observation at IX with movable thread.	3	18.40	-12.14
15 18	...	80.1	29.849		4	17.74	...
15 21	78.2	...	...		5	18.53	...
15 31	77.6	...	...		6	18.68	...
15 52	77.2	...	...		7	15.58	...
16 18	76.8	...	...		8	16.90	...
16 26	76.5	78.4	29.840		9	15.74	...
26 13 58.5	78.3	...	...		10	16.83	+ 3.00
14 4	78.0	79.8	29.618		11	18.12	-10.88
27 14 33	72.6	72.3	29.742		12	17.64	...
14 46	72.5	...	...		13	18.94	...
14 58	71.8	...	...		14	18.02	+ 4.48
15 21	69.9	...	...		15	19.08	...
15 28.5	69.7	...	...	Notes.	16	18.77	+ 1.40
15 34	69.5	72.0	29.756	3. Very faint; poor observation.	17	17.66	...
15 46	69.9	...	...	4.8 E. Faint; clouds.	18	17.76	...
15 59.5	69.9	...	...	6.7. Clouds.			
16 5	69.8	...	...	11. Observation hurried; poor.			
16 13	69.7	...	...		
16 18	69.9	...	...		
16 27.5	69.5	...	...		
16 33	69.8	71.0	29.766				

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
	July 1, L.			<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Boötis	W E	2.5 ...	14 28 ... ...	... ...	47.15 48.15	48.95 49.95	27.511 27.511	36 8 25.62 36 32 46.80	- 0.38 + 0.66	- 0.17 + 0.17	- 0.19 + 0.19	+38 43 5.07 ...
2	μ Libræ	W E	3 ...	14 41 22.0 14 46 52.0	2 41.7 2 48.3	47.10 48.10	48.85 49.90	... ...	343 42 13.20 89 2 22.48	+ 0.11 + 1.18	+13.55 -14.68	-1 11.32 +1 11.35	-13 45 45.86 ...
3	δ Boötis (<i>n. fol.</i>)	E W	... ...	15 1 ... ...	... ...	48.10 47.55	49.90 49.20	25.887 25.887	27 15 53.98 45 27 26.05	+ 1.84 + 1.16	+ 0.24 - 0.24	- 8.73 + 8.73	+48 1 10.72 ...
4	204 B. Boötis	W E	3 ...	14 26 ... ...	... ...	50.00 49.00	50.15 49.35	25.984 25.984	39 39 24.98 33 3 49.88	+ 1.54 + 0.64	- 0.19 + 0.19	+ 3.20 - 3.20	+42 13 7.55 ...
5	295 B. Boötis	E W	2 ...	14 45 ... ...	... ...	48.90 50.35	49.05 50.05	26.901 26.901	37 4 24.32 35 37 32.02	+ 1.52 + 2.85	+ 0.17 - 0.17	+ 0.70 - 0.70	+38 11 50.48 ...
6	δ Boötis (<i>n. fol.</i>)	W E	3 ...	15 1 ... ...	... ...	49.50 48.75	49.85 49.05	26.004 26.004	45 27 23.10 27 15 50.72	+ 1.14 + 0.36	- 0.24 + 0.24	+ 8.92 - 8.92	+48 1 11.80 ...
7	ι Lupi	E W	4 ...	15 6 6.0 15 11 24.0	2 40.3 2 37.7	49.00 50.00	49.15 50.25	... ...	106 25 37.25 326 18 54.82	+ 1.11 + 2.15	- 9.92 + 9.00	+2 32.14 -2 32.15	-31 10 26.54 ...
8	β Coronæ Borealis	E W	2.5 ...	15 24 ... ...	... ...	48.60 50.15	49.10 50.40	26.877 26.877	45 50 24.12 26 51 35.20	+ 1.40 + 2.92	+ 0.12 - 0.12	+ 9.32 - 9.32	+29 25 43.40 ...
9	3 H. Scorpïi	W E	4 ...	15 28 29.0 15 33 48.0	2 44.6 2 34.4	50.00 48.70	50.00 49.05	... ...	329 39 13.65 103 5 17.20	+ 2.04 + 0.89	+11.07 - 9.74	-2 8.77 +2 8.88	-27 49 43.08 ...
10	ϵ Serpentis	E W	2.5 ...	15 43 14.5 15 48 42.0	2 47.1 2 40.4	48.60 50.35	48.65 50.30	... ...	70 31 47.42 2 12 48.82	+ 0.66 + 2.35	-21.03 +19.37	+ 37.87 - 37.88	+ 4 45 30.41 ...
11	θ Draconis	E W	3 ...	15 57 19.0 16 2 47.0	2 41.1 2 40.9	48.15 50.20	48.35 50.25	... ...	16 28 37.10 56 15 58.52	+ 0.21 + 2.20	+16.75 -17.98	- 20.23 + 20.23	+58 49 1.11 ...
12	σ Scorpïi	W E	4 ...	16 12 30.0 16 18 1.0	2 53.3 2 37.7	49.85 48.20	49.90 48.70	... ...	332 6 28.28 100 38 2.82	+ 1.87 + 0.38	+12.78 -10.58	-1 55.36 +1 55.41	-25 22 13.69 ...
13	β Herculis	E W	3 ...	16 23 55.0 16 28 34.0	2 9.2 2 29.8	48.10 50.30	48.55 50.35	... ...	53 35 58.95 19 8 23.38	+ 0.25 + 2.32	-22.23 +29.87	+ 17.35 - 17.36	+21 41 38.48 ...
14	42 Herculis	W E	2.5 ...	16 33 25.5 16 38 40.5	2 39.3 2 35.7	50.20 48.05	50.00 48.25	... ...	46 34 15.30 26 10 20.95	+ 2.09 + 0.10	-39.81 +38.04	+ 10.07 - 10.07	+49 6 45.86 ...
15	24 Ophiuchi	E W	4 ...	16 48 11.0 16 53 37.0	2 51.7 2 34.3	48.65 50.00	48.75 49.70	... ...	98 16 12.98 334 28 22.75	+ 0.65 + 1.84	-13.05 +10.54	+1 44.40 -1 44.42	-23 0 10.60 ...
16	ϵ Boötis	W E	3 ...	14 38 2.0 14 43 32.3	2 44.3 2 46.0	46.55 47.90	47.55 49.00	... ...	24 54 32.30 47 50 7.58	+ 0.01 + 1.42	+51.16 -52.22	- 11.00 + 11.00	+27 28 8.88 ...
17	ξ^2 Libræ	E W	3 ...	14 48 48.0 14 54 15.0	2 46.2 2 40.8	47.95 47.55	49.25 48.80	... ...	86 18 49.12 346 25 46.32	+ 1.61 + 1.73	-15.03 +14.07	+1 4.40 -1 4.41	-11 2 4.92 ...
18	ι Lupi	W E	3.5 ...	15 6 10.0 15 11 36.0	2 36.6 2 49.4	47.30 47.85	48.55 48.90	... ...	326 18 51.80 106 25 43.08	+ 0.93 + 1.45	+ 9.47 -11.08	-2 28.32 +2 28.38	-31 10 27.44 ...

Time.	Ther. 1882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.	No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>mm.</i>			<i>° ' "</i>	<i>"</i>
1 13 31	77.0	...	...	1.4.6 Instrument in meridian, observation at VIII with movable thread	1	36 22 18.48	...
13 44	76.6	79.0	29.994	3 5.8. Instrument in meridian, observation at II with movable thread	2	17.94	+ 3.03
15 1	76.5	...	...		3	17.32	-13.23
1 11 26	70.1	...	...		4	18.20	-12.73
14 34	...	74.3	29.889		5	17.88	-11.78
14 45	69.2	...	...		6	18.25	-14.61
15 1	69.1	...	...		7	17.50	+ 6.73
15 6.5	69.1	...	...		8	18.06	...
15 14.5	69.1	...	...		9	17.61	+ 4.69
15 23	68.6	...	...		10	18.79	...
15 28.5	68.6	...	...		11	18.40	...
15 34	68.6	79.2	29.994		12	17.80	...
15 46	67.8	...	...		13	16.76	...
16 0	67.4	...	...		14	18.34	-11.44
16 10.8	67.3	...	...		15	17.51	- 0.56
16 15.5	67.2	...	...		16	20.12	...
16 20	66.8	...	...	Notes	17	18.64	...
16 27	66.8	...	...	2.18. Paint, clouds.	18	17.80	+ 6.74
16 37	66.7	...	...	Paint.			
16 44	66.6	...	...	6. Poor			
1 14 41	76.5	69.2	29.896				
14 52	76.7	81.7	29.921				
14 60	78.0	...	...		
15 28	71.8	...	...		
15 31	77.4	...	...		

No.	Date, observer, and object.	Circle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to meridian.	Refraction.	Apparent declination.
				<i>h m s</i>	<i>m s</i>	<i>d</i>	<i>d</i>	<i>r</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>	<i>' "</i>	<i>° ' "</i>
1	γ Libræ	E	2.5	15 27 31.0	2 39.6	48.00	49.05	.....	89 45 21.40	+ 1.57	-13.03	+1 13.01	-14 28 47.75
		W	...	15 32 32.0	2 21.4	48.30	49.45	.....	342 59 15.25	+ 1.92	+10.23	-1 13.03	
2	α Serpentis	W	3	15 36 40.5	2 51.8	48.05	49.20	.....	4 10 22.78	+ 1.61	+23.34	- 34.26	+ 6 43 9.54
		E	...	15 42 15.0	2 42.7	47.90	49.15	.....	68 34 12.65	+ 1.49	-20.94	+ 34.27	
3	π Scorpii	W	3.5	15 50 20.0	2 44.9	48.40	49.65	.....	331 37 53.52	+ 2.12	+11.48	-1 54.81	-25 50 50.36
		E	.....	15 55 43.0	2 38.1	48.05	49.15	.....	101 6 40.15	+ 1.63	-10.55	+1 54.87	
4	φ Herculis	E	...	16 6 .....	.....	47.90	48.85	26.967	30 5 25.72	+ 2.01	+ 0.22	- 5.98	+45 10 54.20
		W	...	.....	.....	48.80	49.75	26.967	42 36 28.65	+ 2.87	- 0.22	+ 5.98	
5	γ Herculis	W	3	16 14 57.0	2 43.2	48.10	49.45	.....	16 49 11.62	+ 1.82	+31.86	- 19.36	+19 22 22.96
		E	...	16 20 20.0	2 39.8	48.05	49.20	.....	55 55 22.60	+ 1.68	-30.54	+ 19.36	
6	July 8, L. ε Boötis	E	3	14 38 1.5	2 44.8	48.20	49.80	.....	47 50 4.58	+ 1.54	-51.46	+ 10.89	+27 28 8.58
		W	...	14 43 24.0	2 37.7	49.20	50.15	.....	24 54 31.12	+ 2.25	+47.13	- 10.89	
7	321 B. Boötis	W	3	14 49 6.0	2 34.7	48.55	49.65	.....	12 16 24.38	+ 1.67	+24.05	- 24.04	+14 49 24.32
		E	...	14 54 7.0	2 26.3	47.85	49.45	.....	60 28 6.80	+ 1.19	-21.51	+ 24.04	
8	β Coronæ Borealis	W	2.5	15 24 .....	.....	48.50	49.70	27.077	26 51 31.08	+ 1.01	- 0.19	- 9.00	+29 25 44.53
		E	...	.....	.....	47.30	48.85	27.077	45 50 17.88	- 0.13	+ 0.19	+ 9.00	
9	α Coronæ Borealis	E	2.5	15 28 7.5	2 28.6	48.15	49.10	.....	48 16 13.08	+ 1.18	-40.50	+ 11.35	+27 1 48.47
		W	...	15 33 9.0	2 32.9	49.20	50.30	.....	24 28 15.12	+ 2.32	+42.86	- 11.36	
10	ε Coronæ Borealis	W	2.5	15 50 49.0	2 46.4	48.50	49.60	.....	24 35 20.00	+ 1.67	+51.22	- 11.26	+27 8 59.45
		E	...	15 56 16.5	2 41.1	47.75	48.90	.....	48 9 11.65	+ 0.92	-48.00	+ 11.26	
11	φ Herculis	W	2.5	16 6 .....	.....	49.00	50.20	27.107	42 36 24.80	+ 1.44	- 0.34	+ 5.93	+45 10 54.79
		E	...	.....	.....	47.50	48.80	27.107	30 5 20.92	+ 0.02	+ 0.34	- 5.93	
12	98 B. Draconis	E	2.5	16 19 38.0	2 36.9	48.15	49.35	.....	19 52 17.15	+ 1.30	+20.87	- 16.02	+55 25 12.37
		W	...	16 24 52.0	2 37.1	50.00	50.70	.....	52 52 16.90	+ 2.94	-20.92	+ 16.03	
13	42 Herculis	E	2.5	16 33 25.5	2 39.6	48.00	49.10	.....	26 10 15.75	+ 1.10	+39.96	- 9.74	+49 6 48.15
		W	...	16 38 39.0	2 33.9	50.00	50.70	.....	46 34 14.75	+ 2.94	-37.16	+ 9.74	
14	24 Ophiuchi	W	3.5	16 48 22.0	2 41.1	49.75	50.60	.....	334 28 17.90	+ 2.76	+11.49	-1 41.00	-23 0 10.07
		E	...	16 53 43.0	2 39.9	47.95	48.80	.....	98 16 13.85	+ 0.92	-11.32	+1 40.94	
15	98 H ¹ . Herculis	E	2	17 5 .....	.....	48.20	49.10	26.174	34 38 22.60	+ 1.93	+ 0.29	- 1.63	+40 38 24.57
		W	...	.....	.....	49.90	50.80	26.174	38 4 34.20	+ 3.69	- 0.29	+ 1.63	
16	ξ Ophiuchi	W	4	17 12 29.0	2 48.5	49.45	50.20	.....	336 27 31.52	+ 2.49	+12.99	-1 33.04	-21 0 47.21
		E	...	17 17 43.0	2 25.5	48.00	48.65	.....	96 16 57.22	+ 0.91	- 9.69	+1 33.04	
17	51 Ophiuchi	E	4	17 22 46.0	2 50.2	47.65	48.55	.....	99 9 27.62	+ 0.72	-12.64	+1 44.74	-23 53 25.55
		W	...	17 28 8.0	2 31.8	49.95	50.65	.....	333 35 8.02	+ 2.95	+10.05	-1 44.79	
18	324 B. Herculis	W	2.5	17 38 .....	.....	49.55	50.40	26.688	40 56 56.28	+ 1.87	- 0.32	+ 4.36	+43 31 8.22
		E	...	.....	.....	47.70	48.70	26.688	31 45 22.80	+ 0.09	+ 0.32	- 4.36	
19	9 G. Sagittarii	E	4	17 47 32.0	2 46.6	47.85	48.80	.....	94 3 28.12	+ 0.94	-13.19	+1 25.39	-18 47 6.78
		W	...	17 52 46.0	2 27.4	50.15	50.95	.....	338 41 6.50	+ 3.20	+10.33	-1 25.43	

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.		No.	Zenith point.	Red. to 1907.0.
<i>d h m</i>	<i>°</i>	<i>°</i>	<i>in.</i>				<i>° ' "</i>	<i>"</i>
6 15 40	76.8	79.0	29.654	4.	Instrument in meridian, observation at II with movable thread.	1	36 22 18.60	.....
15 50.5	76.5	.....	.....	8, 11, 18.	Instrument in meridian, observation at IX with movable thread.	2	20.47	.....
15 56	76.2	.....	.....	15.	Instrument in meridian, observation at I with movable thread.	3	19.20	+ 3.07
16 6	76.1	.....	.....			4	19.54	.....
16 21	75.8	78.0	29.664			5	19.52	.....
8 14 41	85.2	.....	.....			6	17.58	.....
14 47	.....	86.8	29.744			7	18.29	.....
14 52	84.6	.....	.....			8	19.33	.....
15 29	83.8	.....	.....			9	17.02	.....
15 37	83.6	85.1	29.754			10	18.73	.....
15 54	82.9	.....	.....			11	19.22	.....
16 23	81.7	.....	.....			12	19.12	-13.82
16 36	81.6	.....	.....			13	18.67	-12.75
16 [40]	.....	82.7	29.769			14	17.77	- 0.59
16 48.5	81.3	.....	.....			15	18.74	-11.01
16 54	81.6	.....	.....			16	17.72	- 2.19
17 5	81.6	.....	.....			17	18.34	- 2.29
17 12.5	81.9	.....	.....			18	19.05	-10.18
17 18	81.9	.....	.....			19	17.93	- 4.19
17 23	81.8	.....	.....			
17 28.5	81.5	.....	.....			
17 38	81.2	.....	.....			
17 48	81.2	82.2	29.768					
17 52	80.9	.....	.....			

Notes.
4.5. Faint; clouds.
18. Very faint.

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refraction.	Apparent declination
1	July 9, L. α Coronæ Borealis	W E	2.5 ...	<i>h m s</i> 15 28 4.3 15 33 6.3	<i>m s</i> 2 31.9 2 30.1	<i>d</i> 48.45 49.00	<i>d</i> 49.30 50.15	<i>r</i>	<i>° ' "</i> 24 28 20.02 48 16 13.90	<i>"</i> + 0.36 + 1.07	<i>"</i> +42.31 -41.31	<i>' "</i> - 11.51 + 11.51	<i>° ' "</i> +27 1 49.55
2	α Serpentis	E W	2.5 ...	15 36 42.0 15 42 14.5	2 50.5 2 42.0	49.05 48.65	50.30 49.70	..... .....	68 34 10.40 4 10 24.00	+ 1.16 + 0.67	-22.99 +20.76	+ 34.40 - 34.40	+ 6 43 10.58
3	ε Coronæ Borealis	E W	2.5 ...	15 51 9.0 15 56 8.5	2 26.5 2 33.0	48.95 49.05	50.15 50.05	..... .....	48 9 0.30 24 35 27.65	+ 1.09 + 1.12	-39.71 +43.31	+ 11.40 - 11.41	+27 9 0.35
4	δ Ophiuchi	W E	3 ...	16 6 31.0 16 12 2.0	2 48.7 2 42.3	48.55 48.65	49.65 49.70	..... .....	354 0 19.92 78 44 15.72	+ 0.58 + 0.66	+17.89 -16.56	- 49.91 + 49.93	- 3 27 14.09
5	98 B. Draconis	W E	2.5 ...	16 19 49.0 16 24 51.0	2 26.0 2 36.0	49.05 48.50	50.35 49.50	..... .....	52 52 14.32 19 52 16.88	+ 1.20 + 0.48	-18.07 +20.63	+ 16.25 - 16.25	+55 25 12.53
6	ζ Ophiuchi	E W	2.5 ...	16 29 10.0 16 34 30.0	2 43.8 2 36.2	48.55 49.50	49.60 50.60	..... .....	85 39 24.42 347 5 8.70	+ 0.63 + 1.62	-14.77 +13.43	+1 3.59 -1 3.57	-10 22 40.29
7	18 Ophiuchi	W E	4 ...	16 41 14.0 16 46 33.0	2 42.5 2 36.5	49.35 48.70	50.20 49.90	..... .....	332 59 56.58 99 44 36.92	+ 1.39 + 0.80	+11.40 -10.58	-1 48.86 +1 48.90	-24 28 41.21
8	κ Ophiuchi	E W	3 ...	16 51 3.0 16 55 30.0	2 4.5 2 22.5	48.60 49.90	49.85 51.00	..... .....	65 45 58.95 6 58 29.50	+ 0.70 + 1.97	-13.21 +17.32	+ 30.88 - 30.88	+ 9 31 16.85
9	ξ Ophiuchi	E W	4 ...	17 12 29.0 17 17 48.0	2 48.6 2 30.4	48.95 49.70	50.00 50.65	..... .....	96 16 57.75 336 27 37.10	+ 1.01 + 1.77	-13.01 +10.35	+1 34.42 -1 34.47	-21 0 46.16
10	β Ophiuchi	E W	3 ...	17 35 47.0 17 41 20.0	2 57.4 2 35.6	48.75 49.90	49.55 50.85	..... .....	70 40 51.02 2 3 46.72	+ 0.68 + 1.99	-23.61 +18.17	+ 37.46 - 37.46	+ 4 36 28.49
11	July 11, L. γ Coronæ Borealis	W E	2.5 ...	15 36 13.7 15 41 15.5	2 27.9 2 33.9	48.55 49.30	49.55 50.30	..... .....	24 2 9.45 48 42 28.22	- 0.11 + 0.67	+38.87 -42.08	- 11.92 + 11.93	+26 35 35.33
12	ζ Herculis	E W	2.5 ...	15 49 ..... .....	..... .....	49.25 48.70	50.65 50.05	27.627 27.627	32 32 54.80 40 8 3.68	+ 1.37 + 0.78	+ 0.20 - 0.20	- 3.62 + 3.62	+42 42 54.11
13	β ¹ Scorpii	W E	3.5 ...	15 57 16.0 16 2 23.0	2 37.3 2 29.7	48.85 48.95	50.35 50.25	..... .....	337 55 12.08 94 49 17.85	+ 0.50 + 0.51	+11.61 -10.52	-1 28.64 +1 28.65	-19 33 3.92
14	δ Ophiuchi	E W	2.5 ...	16 6 44.5 16 11 51.0	2 35.3 2 31.2	48.95 48.90	50.55 50.30	..... .....	78 44 11.98 354 0 21.00	+ 0.59 + 0.46	-15.16 +14.37	+ 49.76 - 49.77	- 3 27 14.01
15	κ Ophiuchi	W E	3 ...	16 50 35.0 16 55 55.0	2 32.6 2 47.4	49.00 48.90	50.45 50.25	..... .....	6 58 27.58 65 46 9.90	+ 0.59 + 0.42	+19.85 -23.89	- 30.79 + 30.80	+ 9 31 16.55
16	98 H ¹ . Herculis	W E	2 ...	17 5 ..... .....	..... .....	49.10 48.85	50.50 50.30	26.277 26.277	38 4 34.22 34 38 17.48	+ 0.09 - 0.16	- 0.19 + 0.19	+ 1.64 - 1.64	+40 38 26.49
17	ε Herculis	E W	..... .....	17 14 ..... .....	..... .....	48.80 49.15	50.00 50.45	25.903 25.903	37 53 25.42 34 49 54.58	+ 1.05 + 1.48	+ 0.26 - 0.26	+ 1.46 - 1.46	+37 23 29.6

No.	Date, observer, and object.	Cir- cle.	See- ing.	Clock time.	Hour angle.	Upper level.	Lower level.	Microm. reading.	Circle reading.	Inst. corr.	Red. to merid- ian.	Refrac- tion.	Apparent declination.
1	π Herculis	W E	2	$\begin{smallmatrix} h & m & s \\ 17 & 12 & \dots \end{smallmatrix}$	$\begin{smallmatrix} m & s \\ \dots & \dots \end{smallmatrix}$	$\begin{smallmatrix} d \\ 49.45 \\ 48.50 \end{smallmatrix}$	$\begin{smallmatrix} d \\ 50.15 \\ 49.55 \end{smallmatrix}$	$\begin{smallmatrix} r \\ 27.152 \\ 27.152 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ 34 & 20 & 35.78 \\ 38 & 21 & 4.75 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +0.82 \\ +0.04 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -0.16 \\ +0.16 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -1.94 \\ +1.94 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ +36 & 55 & 0.35 \\ & & & \end{smallmatrix}$
2	χ Herculis	W E	2	$\begin{smallmatrix} h & m & s \\ 17 & 24 & \dots \end{smallmatrix}$	$\begin{smallmatrix} m & s \\ \dots & \dots \end{smallmatrix}$	$\begin{smallmatrix} d \\ 49.40 \\ 48.05 \end{smallmatrix}$	$\begin{smallmatrix} d \\ 50.30 \\ 49.20 \end{smallmatrix}$	$\begin{smallmatrix} r \\ 26.554 \\ 26.554 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ 45 & 46 & 16.50 \\ 26 & 56 & 12.35 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +0.85 \\ -0.42 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -0.24 \\ +0.24 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +9.22 \\ -9.22 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ +48 & 20 & 28.24 \\ & & & \end{smallmatrix}$
3	324 B. Herculis	E W	2	$\begin{smallmatrix} h & m & s \\ 17 & 38 & \dots \end{smallmatrix}$	$\begin{smallmatrix} m & s \\ \dots & \dots \end{smallmatrix}$	$\begin{smallmatrix} d \\ 48.35 \\ 49.75 \end{smallmatrix}$	$\begin{smallmatrix} d \\ 49.35 \\ 50.45 \end{smallmatrix}$	$\begin{smallmatrix} r \\ 26.776 \\ 26.776 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ 31 & 45 & 18.90 \\ 40 & 56 & 50.28 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +1.04 \\ +3.61 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +0.21 \\ -1.60 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -4.48 \\ +4.48 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ +43 & 31 & 7.10 \\ & & & \end{smallmatrix}$
4	ζ Herculis	W E	2	$\begin{smallmatrix} h & m & s \\ 17 & 54 & \dots \end{smallmatrix}$	$\begin{smallmatrix} m & s \\ \dots & \dots \end{smallmatrix}$	$\begin{smallmatrix} d \\ 49.00 \\ 48.05 \end{smallmatrix}$	$\begin{smallmatrix} d \\ 49.85 \\ 48.95 \end{smallmatrix}$	$\begin{smallmatrix} r \\ 27.192 \\ 27.192 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ 26 & 41 & 18.48 \\ 46 & 0 & 19.68 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ +0.33 \\ -0.69 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -0.18 \\ +0.18 \end{smallmatrix}$	$\begin{smallmatrix} '' \\ -9.48 \\ +9.48 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ +29 & 15 & 36.80 \\ & & & \end{smallmatrix}$

Time.	Ther. 3882.	Att. ther.	Barom.	Observation made at V with fixed thread, except as noted below.				No.	Zenith point.	Red. to 1907.0.
$\begin{smallmatrix} d & h & m \\ 13 & 12 & 12 \\ 17 & 24 & \\ 17 & 38 & \\ 17 & 54 & \end{smallmatrix}$	$\begin{smallmatrix} ^\circ \\ 69.5 \\ 69.5 \\ 68.8 \\ 68.6 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ \\ \dots \\ \dots \\ 70.7 \\ \dots \end{smallmatrix}$	$\begin{smallmatrix} m. \\ \dots \\ \dots \\ 29.853 \\ \dots \end{smallmatrix}$	1, 2. Instrument in meridian, observation at VIII with movable thread. 3. Instrument in meridian; E. observation at II: W. observation at IX + 30° with movable thread. 4. Instrument in meridian, observation at IX with movable thread.				$\begin{smallmatrix} 1 \\ 2 \\ 3 \\ 4 \end{smallmatrix}$	$\begin{smallmatrix} ^\circ & ' & '' \\ 36 & 22 & 18.18 \\ & & 17.69 \\ & & 18.34 \\ & & 18.01 \end{smallmatrix}$	$\begin{smallmatrix} \dots \\ \dots \\ -12.21 \\ -11.60 \\ -9.83 \end{smallmatrix}$
Note. 3. Very faint.										

RESULTS
OF
OBSERVATIONS.

INDIVIDUAL RESULTS OF OBSERVATIONS.

For explanation, see page XXXVII.

<p>33 Piscium $0^h 0^m 13^s$ $-6^{\circ} 16'$ $0''.95$</p> <p>1898 Nov. 11 H. $+0.2$ I 25 H. 0.0 I Dec. 1 H. -0.1 I 1904 Nov. 30 L. $+1.0$ III 1905 Dec. 11 L. $+1.7$ III</p> <p>Mean..... $+0.56$ Corr. -0.47</p>	<p>7 Pegasi $0^h 8^m 5^s$ $+14^{\circ} 37'$ $39''.43$</p> <p>1898 Nov. 15 H. -0.6 I 1905 Dec. 6 L. -0.1 III 7 L. $+0.2$ III</p> <p>Mean..... -0.17 Corr. -0.23</p>	<p>d Piscium $0^h 15^m 27^s$ $+7^{\circ} 38'$ $5''.70$</p> <p>1899 Nov. 24 H. $+0.6$ I 1904 Nov. 7 L. $+0.5$ III 11 L. $+0.7$ III 1906 Dec. 4 L. $+0.4$ IV 7 L. $+0.5$ IV 25 L. -0.2 IV</p> <p>Mean..... $+0.42$ Corr. -0.32</p>	<p>κ Cassiopeiae $0^h 27^m 19^s$ $+62^{\circ} 22'$ $47''.61$</p> <p>1899 Nov. 24 H. -0.4 I 1904 Nov. 7 L. -0.7 III 19 L. -0.7 III 1906 Nov. 13 L. -0.6 IV Dec. 4 L. 0.0 IV</p> <p>Mean..... -0.48 Corr. $+0.41$</p>
<p>5 Ceti $0^h 3^m 5^s$ $-3^{\circ} 0'$ $14''.36$</p> <p>1904 Nov. 19 L. -0.9 III 26 L. -0.5 III 1906 Nov. 23 L. -1.3 IV Dec. 4 L. -1.2 IV</p> <p>Mean..... -0.98 Corr. -0.44</p>	<p>35 Piscium $0^h 9^m 50^s$ $+8^{\circ} 15'$ $56''.41$</p> <p>1899 Nov. 27 H. -0.9 I 1905 Dec. 4 L. $+0.3$ III 5 L. $+0.7$ III 1906 Dec. 12 L. $+0.3$ IV 24 L. $+0.7$ IV</p> <p>Mean..... $+0.22$ Corr. -0.31</p>	<p>ρ Andromedæ $0^h 15^m 51^s$ $+37^{\circ} 24'$ $52''.66$</p> <p>1899 Dec. 12 H. $+0.2$ I 1904 Dec. 21 L. $+0.5$ III 1905 Dec. 18 L. $+0.4$ III 19 L. $+0.4$ III 1906 Nov. 21 L. $+1.0$ IV Dec. 2 L. $+0.9$ IV</p> <p>Mean..... $+0.57$ Corr. $+0.07$</p>	<p>77 G. Sculptoris $0^h 28^m 44^s$ $-30^{\circ} 6'$ $''$</p> <p>1904 Dec. 20 L. 32.94 III 21 L. 32.42 III 1906 Nov. 21 L. 33.86 IV 28 L. 33.40 IV</p> <p>Mean..... -30.6 33.16 Corr. -0.65</p>
<p>α Andromedæ $0^h 3^m 13^s$ $+28^{\circ} 32'$ $17''.51$</p> <p>1898 Nov. 1 H. $+0.3$ I 1904 July 10 L. $+0.1$ III 1905 Dec. 12 L. -0.9 III</p> <p>Mean..... -0.17 Corr. -0.05</p>	<p>318 B. Cephei $0^h 10^m 33^s$ $+76^{\circ} 23'$ $42''.34$</p> <p>1899 Dec. 2 H. -2.2 I 1904 Dec. 14 L. -1.3 III 16 L. -0.5 III</p> <p>Mean..... -1.33 Corr. $+0.57$</p>	<p>44 Piscium $0^h 20^m 17^s$ $+1^{\circ} 23'$ $9''.08$</p> <p>1898 Nov. 30 H. -0.1 I 1904 Dec. 8 L. $+0.8$ III 13 L. $+0.9$ III 1906 Dec. 12 L. $+0.3$ IV 24 L. $+0.5$ IV</p> <p>Mean..... $+0.48$ Corr. -0.39</p>	<p>13 Ceti $0^h 30^m 6^s$ $-4^{\circ} 8'$ $35''.89$</p> <p>1899 Dec. 2 H. -1.4 I 1905 Jan. 4 L. -0.5 III Dec. 7 L. $+0.3$ III 1906 Dec. 7 L. -0.1 IV 12 L. 0.0 IV</p> <p>Mean..... -0.34 Corr. -0.45</p>
<p>β Cassiopeiae $0^h 3^m 50^s$ $+58^{\circ} 35'$ $52''.91$</p> <p>1898 Nov. 7 H. -0.4 I 20 H. $+0.5$ I 1905 Dec. 18 L. 0.0 III 19 L. $+0.2$ III 1906 Dec. 2 L. $+0.3$ IV 25 L. $+0.3$ IV</p> <p>Mean..... $+0.15$ Corr. $+0.36$</p>	<p>318 B. Cephei s. p. $0^h 10^m 33^s$ $+76^{\circ} 23'$ $42''.34$</p> <p>1903 May 2 H. $+1.5$ II 8 H. $+2.0$ II 13 E. $+2.0$ II 21 E. $+1.1$ II 1904 Dec. 13 L. $+1.9$ III 20 L. $+0.6$ III</p> <p>Mean..... $+1.52$ Corr. -0.80</p>	<p>10 Ceti $0^h 21^m 30^s$ $-0^{\circ} 36'$ $11''.72$</p> <p>1899 Nov. 27 H. -0.6 I 1905 Dec. 5 L. $+0.1$ III 7 L. $+0.4$ III</p> <p>Mean..... -0.03 Corr. -0.41</p>	<p>ζ Cassiopeiae $0^h 31^m 24^s$ $+53^{\circ} 20'$ $47''.67$</p> <p>1899 Nov. 27 H. -1.8 I 1905 Dec. 11 L. -0.5 III 12 L. -0.4 III</p> <p>Mean..... -0.90 Corr. $+0.29$</p>
<p>22 Andromedæ $0^h 5^m 7^s$ $+45^{\circ} 30'$ $56''.82$</p> <p>1898 Nov. 30 H. -0.1 I 1904 Nov. 7 L. -0.1 III 11 L. $+1.2$ III 1906 Nov. 13 L. -0.1 IV 21 L. $+0.6$ IV</p> <p>Mean..... $+0.30$ Corr. $+0.18$</p>	<p>σ Andromedæ $0^h 13^m 6^s$ $+36^{\circ} 13'$ $50''.84$</p> <p>1898 Nov. 19 H. $+0.6$ I Dec. 1 H. -1.5 I 1904 Nov. 19 L. $+0.7$ III 1905 Dec. 11 L. $+0.4$ III</p> <p>Mean..... $+0.05$ Corr. $+0.05$</p>	<p>12 Ceti $0^h 24^m 56^s$ $-4^{\circ} 30'$ $35''.34$</p> <p>1898 Nov. 19 H. -0.3 I Dec. 1 H. $+0.1$ I 1903 Dec. 7 L. $+0.4$ III 14 L. $+1.1$ III 1904 Nov. 30 L. $+0.3$ III Dec. 14 L. $+0.9$ III</p> <p>Mean..... $+0.42$ Corr. -0.45</p>	<p>π Andromedæ $0^h 31^m 32^s$ $+33^{\circ} 10'$ $7''.99$</p> <p>1898 Nov. 15 H. -0.1 I 20 H. $+0.7$ I 30 H. $+1.0$ I 1905 Dec. 13 L. -0.5 III 19 L. $+0.1$ III</p> <p>Mean..... $+0.24$ Corr. $+0.01$</p>
<p>κ^2 Sculptoris $0^h 0^m 30^s$ $-28^{\circ} 21'$ $''$</p> <p>1903 Nov. 14 H. 24.55 II 1904 Dec. 8 L. 22.47 III 13 L. 23.38 III 1906 Dec. 7 L. 23.74 IV 11 L. 22.88 IV</p> <p>Mean..... -28.21 23.40 Corr. -0.64</p>	<p>ϵ Ceti $0^h 14^m 20^s$ $-9^{\circ} 22'$ $41''.83$</p> <p>1898 Nov. 7 H. $+1.2$ I 1904 July 10 L. $+0.1$ III Nov. 26 L. $+0.9$ III</p> <p>Mean..... $+0.73$ Corr. -0.50</p>	<p>49 G. Ceti $0^h 25^m 23^s$ $-24^{\circ} 20'$ $''$</p> <p>1904 Nov. 11 L. 26.58 III 26 L. 25.59 III</p> <p>Mean..... -24.20 26.08 Corr. 0.62</p>	<p>319 B. Cephei $0^h 32^m 12^s$ $+81^{\circ} 56'$ $''$</p> <p>1905 Dec. 5 L. 29.96 III 6 L. 30.94 III</p> <p>Mean..... $+81.56$ 30.45 Corr. $+0.63$</p>

319 B. Cephei s. p.			
0 ^h 32 ^m 12 ^s	+81° 56' "		
1903 May 13 E.	29.88 II		
1905 May 20 L.	31.65 III		
22 L.	31.86 III		

Mean..... +81 56 31.13
Corr. -0.77

82 B. Ceti			
0 ^h 32 ^m 12 ^s	-25° 19' 2".86		
1904 Dec. 13 L.	+0.5 III		
14 L.	+1.1 III		
1906 Dec. 18 L.	+1.7 IV		
24 L.	+0.7 IV		

Mean..... +1.00
Corr. -0.62

ε Andromedæ			
0 ^h 33 ^m 16 ^s	+28° 46' 6".53		
1899 Dec. 12 H.	+0.4 I		
1905 Jan. 14 L.	+0.7 III		
18 L.	+0.4 III		
1906 Dec. 25 L.	-0.4 IV		
26 L.	+0.5 IV		

Mean..... +0.32
Corr. -0.05

δ Andromedæ			
0 ^h 33 ^m 59 ^s	+30° 18' 48".69		
1905 Dec. 21 L.	-0.2 III		
1906 Jan. 16 L.	0.0 III		

Mean..... -0.10
Corr. -0.03

α Cassiopeiæ			
0 ^h 34 ^m 50 ^s	+55° 59' 20".13		
1898 Mar. 31 H.	+0.8 I		
1904 Jan. 21 L.	+0.7 III		
25 L.	+0.6 III		

Mean..... +0.70
Corr. +0.32

β Ceti			
0 ^h 38 ^m 34 ^s	-18° 32' 7".22		
1904 July 10 L.	-0.5 III		
1905 Jan. 20 L.	+0.4 III		

Mean..... -0.05
Corr. -0.58

21 Cassiopeiæ			
0 ^h 39 ^m 2 ^s	+74° 26' 29".26		
1903 Dec. 14 L.	-0.3 III		
1904 Dec. 21 L.	-0.9 III		
1905 Jan. 1 L.	-0.4 III		

Mean..... -0.53
Corr. +0.55

21 Cassiopeiæ s. p.			
0 ^h 39 ^m 2 ^s	+74° 26' 29".23		
1904 Dec. 20 L.	-0.6 III		
1905 Jan. 8 L.	+0.3 III		
1906 Dec. 26 L.	+0.3 IV		

Mean..... 0.00
Corr. -0.82

o Cassiopeiæ			
0 ^h 39 ^m 9 ^s	+47° 44' 13".66		
1904 Nov. 19 L.	-0.9 III		
30 L.	-0.1 III		

Mean..... -0.50
Corr. +0.21

73 G. Ceti			
0 ^h 39 ^m 48 ^s	-22° 33' "		
1904 Nov. 7 L.	19.90 III		
11 L.	20.08 III		
1906 Nov. 28 L.	19.69 IV		
Dec. 4 L.	19.05 IV		

Mean..... -22 33 19.68
Corr. -0.60

ζ Andromedæ			
0 ^h 42 ^m 2 ^s	+23° 43' 23".05		
1904 Dec. 16 L.	-0.2 III		
20 L.	-0.2 III		
1906 Dec. 7 L.	0.0 IV		
12 L.	+0.1 IV		

Mean..... -0.08
Corr. -0.12

η Cassiopeiæ			
0 ^h 43 ^m 3 ^s	+57° 17' 7".40		
1899 Dec. 2 H.	-1.4 I		
1905 Jan. 14 L.	-2.3 III		
18 L.	-1.8 III		

Mean..... -1.83
Corr. +0.34

147 B. Piscium			
0 ^h 43 ^m 8 ^s	+4° 45' 53".11		
1904 Dec. 13 L.	0.0 III		
14 L.	-0.1 III		
1906 Dec. 18 L.	+0.1 IV		
23 L.	+0.4 IV		

Mean..... +0.10
Corr. -0.35

ν Cassiopeiæ			
0 ^h 43 ^m 10 ^s	+50° 25' "		
1905 Jan. 2 L.	22.10 III		
4 L.	22.10 III		
1906 Nov. 13 L.	22.20 IV		
21 L.	23.05 IV		

Mean..... +50 25 22.36
Corr. +0.25

δ Piscium			
0 ^h 43 ^m 30 ^s	+7° 2' 27".08		
1898 Nov. 20 H.	+1.5 I		
Dec. 1 H.	+0.3 I		
1905 Dec. 11 L.	-0.7 III		
12 L.	+0.3 III		

Mean..... +0.35
Corr. -0.33

ν Andromedæ			
0 ^h 44 ^m 18 ^s	+40° 32' 3".24		
1899 Dec. 12 H.	-0.9 I		
1905 Dec. 13 L.	0.0 III		
18 L.	+0.4 III		
1907 Jan. 21 L.	+0.3 IV		

Mean..... -0.05
Corr. +0.11

59 H ¹ . Cassiopeiæ			
0 ^h 44 ^m 39 ^s	+63° 42' 11".24		
1905 Dec. 5 L.	-0.6 III		
6 L.	-0.3 III		
1906 Dec. 24 L.	-0.5 IV		
25 L.	-0.1 IV		

Mean..... -0.38
Corr. +0.42

20 Ceti			
0 ^h 47 ^m 54 ^s	-1° 41' 13".66		
1904 Nov. 19 L.	-0.3 III		
30 L.	-0.6 III		

Mean..... -0.45
Corr. -0.42

γ Cassiopeiæ			
0 ^h 50 ^m 40 ^s	+60° 10' 30".98		
1903 Dec. 7 L.	+0.6 III		
9 L.	+0.8 III		
14 L.	+1.1 III		
15 L.	-1.4 III		

1904 Jan. 21 L. +0.4 III
25 L. +0.1 III
1907 Jan. 23 L. -0.1 IV
26 L. -0.3 IV

Mean..... +0.15
Corr. +0.39

μ Andromedæ			
0 ^h 51 ^m 12 ^s	+37° 57' 25".15		
1898 Nov. 7 H.	+0.9 I		
11 H.	+0.4 I		
15 H.	+1.3 I		
20 H.	-0.4 I		
30 H.	+2.3 I		
1904 Nov. 7 L.	-0.1 III		
11 L.	+0.7 III		

Mean..... +0.73
Corr. +0.08

h Piscium			
0 ^h 52 ^m 25 ^s	+28° 27' 5".45		
1904 Dec. 8 L.	+1.2 III		
13 L.	+1.1 III		
1905 Dec. 21 L.	+1.0 III		
1906 Dec. 7 L.	+0.7 IV		
12 L.	+1.4 IV		

Mean..... +1.08
Corr. -0.05

α Sculptoris			
0 ^h 53 ^m 47 ^s	-29° 53' 52".86		
1904 Dec. 21 L.	+1.7 III		
1905 Jan. 2 L.	+0.8 III		
1906 Nov. 28 L.	+2.3 IV		
Dec. 4 L.	+1.1 IV		

Mean..... +1.48
Corr. -0.65

43 H. Cephei			
0 ^h 55 ^m 1 ^s	+85° 43' 14".72		
1904 Dec. 16 L.	-1.2 III		
1905 Jan. 18 L.	-1.6 III		
1906 Dec. 23 L.	-1.3 IV		
1907 Jan. 21 L.	-0.7 IV		

Mean..... -1.20
Corr. +0.67

43 H. Cephei s. p.			
0 ^h 55 ^m 1 ^s	+85° 43' 14".72		
1903 May 11 E.	+0.9 II		
19 E.	+1.5 II		
28 E.	+1.4 II		
June 3 E.	+1.9 II		
1904 Dec. 20 L.	+0.4 III		
1905 Jan. 16 L.	+0.6 III		
1906 Dec. 18 L.	+0.5 IV		
1907 Jan. 22 L.	+1.8 IV		

Mean..... +1.12
Corr. -0.74

1 B. Ursæ Minoris			
0 ^h 55 ^m 37 ^s	+88° 29' 15".73		
1905 Dec. 5 L.	-1.2 III		
6 L.	-1.2 III		

1 B. Ursæ Minoris s. p.			
0 ^h 55 ^m 37 ^s	+88° 29' 15".76		
1903 May 7 H.	-0.2 II		
10 H.	+0.8 II		
1905 May 2 L.	+0.7 III		
8 L.	+0.3 III		
12 L.	0.0 III		

Mean..... +0.32
Corr. -0.72

ε Piscium			
0 ^h 57 ^m 45 ^s	+7° 21' 6".58		
1899 Dec. 12 H.	-0.1 I		
1905 Dec. 11 L.	0.0 III		
12 L.	+0.3 III		
1906 Dec. 25 L.	+0.9 IV		
1907 Jan. 20 L.	+0.5 IV		

Mean..... +0.32
Corr. -0.32

26 Ceti			
0 ^h 58 ^m 40 ^s	+0° 49' "		
1904 Dec. 14 L.	51.30 III		
20 L.	51.08 III		

Mean..... +0 49 51.19
Corr. -0.40

72 Piscium			
0 ^h 59 ^m 49 ^s	+14° 24' 30".24		
1905 Jan. 4 L.	+0.3 III		
Dec. 7 L.	+0.6 III		
1906 Dec. 18 L.	+0.3 IV		
24 L.	+0.2 IV		

Mean..... +0.35
Corr. -0.24

μ Cassiopeiæ			
1 ^h 1 ^m 37 ^s	+54° 25' 40".82		
1903 Dec. 7 L.	+0.4 III		
9 L.	-0.6 III		
14 L.	+0.1 III		
15 L.	-0.3 III		
16 L.	0.0 III		
1905 Dec. 13 L.	-1.2 III		
18 L.	0.0 III		

Mean..... -0.23
Corr. +0.30

<i>e</i> Piscium			<i>τ</i> Piscium			<i>φ</i> Cassiopeiae s. p.					
1 ^h 3 ^m 13 ^s	+5° 7' 14".28		1 ^h 6 ^m 9 ^s	+29° 33' 31".37		1 ^h 18 ^m 52 ^s	+67° 36' 29".52		1899 May 24 H.	-3.0	I
1904 Dec. 8 L.	-0.4	III	1905 Dec. 6 L.	0.0	III	1905 Jan. 8 L.	+0.1	III	28 H.	-2.0	I
13 L.	-0.6	III	1906 Jan. 16 L.	-0.4	III	19 L.	-1.4	III	June 2 H.	-1.6	I
Mean	-0.50		Dec. 7 L.	+0.1	IV	22 L.	-0.6	IV	Oct. 19 H.	-1.1	I
Corr.	-0.35		12 L.	+0.4	IV	May 13 L.	+0.4	IV	21 H.	-0.7	I
			Mean	+0.02		14 L.	+0.2	IV	24 H.	-2.7	I
			Corr.	-0.04					Nov. 24 H.	-1.4	I
<i>η</i> Ceti			<i>ζ</i>¹ Piscium			109 G. Sculptoris			27 H.	-2.7	I
1 ^h 3 ^m 34 ^s	-10° 42' 44".68		1 ^h 8 ^m 30 ^s	+7° 2' 47".51		1 ^h 18 ^m 52 ^s	-31° 27' "		Dec. 2 H.	-1.4	I
1904 Jan. 21 L.	+0.4	III	1904 Dec. 16 L.	-0.1	III				12 H.	-1.4	I
1905 Jan. 16 L.	+0.7	III	20 L.	-0.6	III				7 L.	-0.7	III
Mean	+0.55		Mean	-0.35		1905 Jan. 2 L.	60.30	III	9 L.	-0.7	III
Corr.	-0.51		Corr.	-0.33		4 L.	58.55	III	11 L.	-1.9	III
						1906 Dec. 7 L.	59.40	IV	14 L.	-1.9	III
						12 L.	59.54	IV	15 L.	-0.9	III
						Mean	-31 27 59.45		16 L.	-1.0	III
						Corr.	-0.65		30 L.	-0.5	III
44 H. Cephei			37 Ceti			<i>θ</i> Ceti			L.	-0.5	III
1 ^h 3 ^m 37 ^s	+79° 8' 30".03		1 ^h 9 ^m 22 ^s	-8° 27' 35".94		1 ^h 19 ^m 1 ^s	-8° 41' 58".73		31 L.	-1.4	III
1905 Jan. 18 L.	-0.9	III	1905 Jan. 4 L.	+1.3	III	1904 Jan. 21 L.	-0.3	III	L.	-0.8	III
20 L.	-0.1	III	Dec. 5 L.	+1.4	III	27 L.	+0.5	III	June 22 L.	-0.8	III
Mean	-0.50		1906 Dec. 25 L.	+1.5	IV				L.	-0.6	III
Corr.	+0.60		1907 Jan. 20 L.	+1.8	IV	1904 Jan. 21 L.	-0.3	III	23 L.	+0.6	III
			Mean	+1.50		27 L.	+0.5	III	L.	-0.5	III
			Corr.	-0.49		1906 Dec. 25 L.	+0.2	IV	July 1 L.	-0.8	III
						1907 Jan. 20 L.	0.0	IV	L.	+0.3	III
						Mean	+0.10		3 L.	+0.2	III
						Corr.	-0.49		L.	-0.1	III
44 H. Cephei s. p.			<i>f</i> Piscium			<i>δ</i> Cassiopeiae			6 L.	-0.3	III
1 ^h 3 ^m 37 ^s	+79° 8' 30".03		1 ^h 12 ^m 38 ^s	+3° 5' 16".35		1 ^h 19 ^m 16 ^s	+59° 42' 56".37		L.	-0.5	III
1902 May 17 H.	+0.8	I	1903 Dec. 7 L.	+1.5	III				7 L.	-0.6	III
1905 Jan. 18 L.	-0.1	III	14 L.	+0.9	III	1904 Jan. 25 L.	-1.0	III	L.	-0.2	III
19 L.	-0.2	III	15 L.	+1.1	III	30 L.	-0.1	III	10 L.	-0.4	III
1906 Dec. 26 L.	+0.8	IV	16 L.	+1.1	III	1907 Jan. 26 L.	-0.5	IV	L.	-0.2	III
Mean	+0.32		1905 Dec. 7 L.	+1.0	III	28 L.	-0.3	IV	12 L.	-1.1	III
Corr.	-0.79		11 L.	+0.8	III	Mean	-0.48		L.	-1.0	III
			1906 Dec. 18 L.	+1.2	IV	Corr.	+0.37		1905 Jan. 20 L.	-0.3	III
			23 L.	+0.9	IV				23 L.	-0.8	III
			Mean	+1.06					27 L.	-0.4	III
			Corr.	-0.37					May 9 L.	-1.0	III
									L.	-1.7	III
<i>β</i> Andromedæ			<i>ν</i> Piscium			<i>ω</i> Andromedæ			12 L.	-1.5	III
1 ^h 4 ^m 8 ^s	+35° 5' 25".46		1 ^h 13 ^m 58 ^s	+26° 44' 18".51		1 ^h 21 ^m 40 ^s	+44° 53' 25".39		L.	-0.9	III
1898 Apr. 1 H.	-1.2	I	1899 Dec. 12 H.	-0.1	I	1904 Dec. 20 L.	0.0	III	19 L.	-1.2	III
Nov. 7 H.	-1.9	I	1905 Dec. 12 L.	+0.3	III	21 L.	-0.4	III	L.	-0.9	III
11 H.	+0.3	I	13 L.	+0.3	III	1906 Nov. 28 L.	-0.5	IV	21 L.	-1.7	III
15 H.	-0.9	I	Mean	+0.17		Dec. 4 L.	-0.4	IV	L.	-1.3	III
20 H.	0.0	I	Corr.	-0.08		Mean	-0.32		22 L.	-0.3	III
30 H.	+0.3	I				Corr.	+0.17		L.	-1.2	III
Dec. 1 H.	-0.8	I							23 L.	-1.6	III
1904 Jan. 27 L.	+0.6	III	<i>l</i> Piscium			<i>α</i> Ursæ Minoris			L.	-1.7	III
June 22 L.	+0.1	III	1 ^h 15 ^m 35 ^s	+28° 12' 54".93		1 ^h 22 ^m 33 ^s	+88° 46' 26".62		5 L.	-1.2	III
July 10 L.	0.0	III	1904 Dec. 13 L.	+1.3	III	1898 Feb. 26 H.	-0.5	I	L.	-1.6	III
Mean	-0.35		14 L.	+1.6	III	Mar. 1 H.	-0.8	I	9 L.	-1.9	III
Corr.	+0.04		Mean	+1.45		3 H.	-0.8	I	L.	-1.7	III
			Corr.	-0.06		5 H.	+0.1	I	12 L.	-1.2	III
						8 H.	-1.3	I	L.	-1.4	III
<i>g</i> Piscium			<i>ξ</i> Andromedæ			Oct.			Dec. 5 L.	-1.2	III
1 ^h 5 ^m 36 ^s	+30° 53' "		1 ^h 16 ^m 27 ^s	+45° 0' 16".80		13 H.	-0.6	I	L.	-1.1	III
1905 Dec. 19 L.	33.91	III	1905 Dec. 18 L.	+0.5	III	14 H.	-0.9	I	6 L.	-1.9	III
21 L.	33.81	III	19 L.	+0.9	III	17 H.	-1.1	I	L.	-0.8	III
1907 Jan. 21 L.	34.59	IV	Mean	+0.70		20 H.	-1.2	I	7 L.	-1.2	III
Mean	+30 53 34.10		Corr.	+0.17		23 H.	-1.0	I	11 L.	-0.5	III
Corr.	-0.02					24 H.	-1.7	I	21 L.	-1.0	III
						27 H.	-0.5	I	30 L.	-1.4	III
						28 H.	-0.9	I	L.	-1.0	III
<i>χ</i> Piscium			<i>φ</i> Cassiopeia			Nov.			1906 Jan. 5 L.	-1.3	III
1 ^h 6 ^m 5 ^s	+20° 30' 11".15		1 ^h 18 ^m 52 ^s	+67° 36' 29".50		1 H.	-1.0	I	L.	-1.7	III
1904 Dec. 21 L.	+0.3	III	1905 Jan. 14 L.	-0.4	III	7 H.	-1.4	I	6 L.	-1.3	III
1905 Jan. 2 L.	-0.3	III	18 L.	-0.4	III	11 H.	-1.4	I	10 L.	-1.1	III
1906 Nov. 28 L.	-0.5	IV	1907 Jan. 21 L.	+0.5	IV	15 H.	-1.9	I	L.	-0.9	III
Dec. 4 L.	+0.1	IV	Mean	-0.10		19 H.	-2.2	I	16 L.	-1.5	III
Mean	-0.10		Corr.	+0.47		23 H.	-2.8	I	L.	-1.7	III
Corr.	-0.16								18 L.	-1.0	III
									L.	-1.0	III
									24 L.	-0.9	III
									L.	-1.2	III

1906 Jan. 29 L.	-1.2 III	1904 June 18 L.	+1.4 III	38 Cassiopeia s. p.		ν Persei	
L.	-1.0 III	22 L.	+0.6 III	1 ^h 23 ^m 47 ^s	+69° 44' 59".78	1 ^h 31 ^m 51 ^s	+48° 7' 17".16
30 L.	-0.9 III	23 L.	+1.2 III				
L.	-0.4 III	25 L.	+0.6 III	1905 Jan. 19 L.	+0.7 III	1904 Jan. 25 L.	+1.2 III
May 4 L.	-2.5 IV	July 2 L.	+0.7 III	May 12 L.	0.0 III	27 L.	-0.1 III
L.	-2.3 IV	L.	+0.4 III	1907 June 6 L.	+3.0 IV	1906 Dec. 12 L.	+0.6 IV
18 L.	-1.1 IV	13 L.	+0.2 III	8 L.	+2.3 IV	25 L.	+0.2 IV
L.	-0.7 IV	L.	-0.2 III	Mean.....	+1.50	Mean.....	+0.48
22 L.	-1.1 IV	1905 Jan. 22 L.	+1.6 III	Corr.	-0.84	Corr.	+0.22
L.	-1.8 IV	28 L.	+1.1 III				
23 L.	-1.2 IV	May 2 L.	+1.5 III				
L.	-2.0 IV	8 L.	+0.4 III				
29 L.	-1.0 IV	19 L.	+0.5 III	48 Ceti		τ Andromedæ	
L.	-1.6 IV	L.	+1.5 III	1 ^h 24 ^m 48 ^s	-22° 8' "	1 ^h 34 ^m 40 ^s	+40° 4' 14".20
30 L.	-2.3 IV	20 L.	+1.1 III				
L.	-2.2 IV	L.	+0.7 III	1904 Dec. 8 L.	46.98 III	1904 Dec. 16 L.	+0.1 III
June 26 L.	-0.4 IV	22 L.	+1.0 III	16 L.	46.90 III	19 L.	+0.3 III
28 L.	-0.8 IV	L.	+1.4 III	Mean.....	-22 8 46.94	Mean.....	+0.20
L.	-1.3 IV	24 L.	+1.4 III	Corr.	-0.60	Corr.	+0.11
Dec. 23 L.	-0.5 IV	June 1 L.	+2.2 III				
Mean.....	-1.15	2 L.	+1.6 III				
Corr.	+0.69	3 L.	+1.9 III				
		L.	+1.8 III	μ Piscium		ω Cassiopeia	
α Ursæ Minoris s. p.		8 L.	+0.7 III	1 ^h 24 ^m 57 ^s	+5° 37' 42".95	1 ^h 34 ^m 56 ^s	+67° 32' 14".24
1 ^h 22 ^m 33 ^s	+88° 46' 26".62	L.	+0.7 III				
		13 L.	+1.6 III	1904 Dec. 13 L.	-1.2 III	1903 Dec. 7 L.	+0.7 III
1898 June 22 H.	-0.4 I	Dec. 4 L.	0.0 III	14 L.	-0.5 III	9 L.	-0.2 III
Sept. 3 H.	+1.2 I	L.	+1.7 III	Mean.....	-0.85	11 L.	-1.0 III
Oct. 9 H.	+1.6 I	5 L.	+0.7 III	Corr.	-0.34	14 L.	+0.3 III
11 H.	+0.8 I	6 L.	+0.9 III			15 L.	-0.7 III
12 H.	+0.7 I	10 L.	+0.3 III			16 L.	-0.1 III
15 H.	+0.8 I	L.	+0.9 III	η Piscium		1905 Jan. 18 L.	-1.0 III
16 H.	+0.9 I	21 L.	+0.5 III	1 ^h 26 ^m 8 ^s	+14° 49' 49".34	20 L.	-1.0 III
18 H.	+1.2 I	L.	+0.3 III			Mean.....	-0.38
19 H.	+0.4 I	29 L.	+0.5 III	1905 Dec. 13 L.	-0.1 III	Corr.	+0.47
23 H.	+1.4 I	L.	+0.2 III	18 L.	+0.1 III		
27 H.	+1.4 I	1906 Jan. 1 L.	+0.9 III	Mean.....	0.00		
30 H.	+0.1 I	L.	+0.6 III	Corr.	-0.23		
Nov. 1 H.	+2.6 I	9 L.	+0.6 III			ω Cassiopeia s. p.	
3 H.	+2.2 I	L.	+1.3 III	40 Cassiopeia		1 ^h 34 ^m 56 ^s	+67° 32' 14".24
6 H.	+1.4 I	16 L.	+1.0 III	1 ^h 30 ^m 31 ^s	+72° 31' 49".55	1905 Jan. 19 L.	+0.2 III
7 H.	+1.6 I	L.	+0.7 III			28 L.	+2.2 III
11 H.	+1.5 I	18 L.	+0.7 III	1905 Jan. 1 L.	-0.7 III	Mean.....	+1.20
14 H.	+0.2 I	L.	+1.2 III	23 L.	-0.7 III	Corr.	-0.85
15 H.	+0.9 I	24 L.	+1.0 III	1907 Jan. 21 L.	-0.4 IV		
20 H.	+1.3 I	L.	+1.1 III	26 L.	-0.3 IV		
21 H.	+0.1 I	29 L.	+0.4 III	Mean.....	-0.52	ν Piscium	
24 H.	+0.1 I	L.	+0.1 III	Corr.	+0.53	1 ^h 36 ^m 14 ^s	+4° 58' 54".00
25 H.	+1.5 I	May 4 L.	+0.8 IV				
26 H.	+0.1 I	L.	+0.5 IV	40 Cassiopeia s. p.		1904 Dec. 20 L.	-0.7 III
28 H.	-0.3 I	18 L.	+1.2 IV	1 ^h 30 ^m 31 ^s	+72° 31' 49".55	21 L.	+0.4 III
30 H.	+1.6 I	L.	+0.3 IV			1906 Dec. 23 L.	+0.3 IV
June 2 H.	+0.3 I	21 L.	+1.0 IV	1905 Jan. 8 L.	+0.6 III	1907 Jan. 20 L.	+0.5 IV
3 H.	+0.8 I	L.	+1.1 IV	22 L.	+1.0 III	Mean.....	+0.12
4 H.	+0.4 I	23 L.	+0.6 IV	1907 Jan. 22 L.	+1.2 IV	Corr.	-0.35
8 H.	+0.2 I	L.	+1.1 IV	30 L.	+0.8 IV		
14 H.	+0.6 I	29 L.	+0.9 IV	Mean.....	+0.90	ϕ Persei	
15 H.	+1.6 I	L.	+1.2 IV	Corr.	-0.83	1 ^h 37 ^m 24 ^s	+50° 11' 6".13
16 H.	+1.1 I	June 2 L.	+0.7 IV			1905 Jan. 2 L.	0.0 III
18 H.	+1.3 I	20 L.	+0.9 IV	ν Andromedæ		4 L.	-0.6 III
19 H.	+0.8 I	L.	+0.9 IV	1 ^h 30 ^m 56 ^s	+40° 54' 17".00	Mean.....	-0.30
20 H.	+1.4 I	25 L.	+1.4 IV			Corr.	+0.24
23 H.	-0.2 I	L.	+1.3 IV	1905 Jan. 2 L.	+0.7 III	τ Ceti	
24 H.	-0.2 I	29 L.	+1.1 IV	4 L.	-0.3 III	1 ^h 39 ^m 25 ^s	-16° 27' 45".23
Oct. 7 H.	+0.6 I	Dec. 18 L.	+0.1 IV	1906 Dec. 7 L.	+0.4 IV	1905 Dec. 30 L.	+0.7 III
9 H.	+1.5 I	L.	+0.3 IV	11 L.	-0.8 IV	1906 Jan. 6 L.	+0.3 III
10 H.	+2.2 I	26 L.	+0.5 IV	Mean.....	0.00	Mean.....	+0.50
14 H.	+0.9 I	1907 Jan. 30 L.	+0.9 IV	Corr.	+0.12	Corr.	-0.56
18 H.	+0.6 I	Mean.....	+0.87				
20 H.	+1.6 I	Corr.	-0.72	π Piscium		σ Piscium	
Nov. 30 H.	+1.4 I			1 ^h 31 ^m 48 ^s	+11° 37' 48".43	1 ^h 40 ^m 7 ^s	+8° 39' 16".42
1902 June 1 H.	+0.2 I	38 Cassiopeia				1899 Dec. 12 H.	+0.9 I
2 H.	+0.4 I	1 ^h 23 ^m 47 ^s	+69° 44' 59".83	1905 Dec. 19 L.	+0.6 III	1906 Jan. 10 L.	+0.4 III
4 H.	-0.3 I			21 L.	+0.3 III	18 L.	+0.9 III
5 H.	+0.4 I	1905 Jan. 20 L.	-0.4 III	1906 Nov. 28 L.	+0.1 IV	1907 Jan. 26 L.	+1.0 IV
1903 May 19 E.	+1.5 II	Dec. 12 L.	+0.2 III	Dec. 4 L.	+1.5 IV	28 L.	+0.4 IV
June 2 E.	+0.6 II	Mean.....	-0.10	Mean.....	+0.62	Mean.....	+0.72
Dec. 7 L.	+0.6 III	Corr.	+0.50	Corr.	-0.27	Corr.	-0.31
14 L.	+1.4 III						

ϵ Sculptoris 1 ^h 40 ^m 58 ^s -25° 33' 8".28			ξ Piscium 1 ^h 48 ^m 23 ^s +2° 41' 38".41			γ Andromedæ 1 ^h 57 ^m 45 ^s +41° 50' 59".59			ξ^1 Ceti 2 ^h 7 ^m 42 ^s +8° 22' 39".38		
1905 Dec. 12 L.	+0.1	III	1905 Jan. 2 L.	+0.6	III	1906 Jan. 18 L.	-0.4	III	1905 Jan. 18 L.	+0.5	III
13 L.	+1.4	III	4 L.	+0.3	III	24 L.	-0.5	III	Feb. 4 L.	+0.7	III
1906 Dec. 11 L.	+0.4	IV	Mean.....	+0.45		1907 Feb. 7 L.	+0.2	IV	1906 Dec. 12 L.	+0.4	IV
12 L.	+0.6	IV	Corr.	-0.38		8 L.	-0.2	IV	25 L.	+0.6	IV
Mean.....	+0.62					Mean.....	-0.22		Mean.....	+0.55	
Corr.	-0.62					Corr.	+0.13		Corr.	-0.31	
χ Ceti 1 ^h 44 ^m 40 ^s -11° 10' 51".77			β Arietis 1 ^h 49 ^m 7 ^s +20° 19' 8".92			ν Fornacis 2 ^h 0 ^m 1 ^s -29° 46' "			μ Fornacis 2 ^h 8 ^m 30 ^s -31° 11' 35".10		
1904 Dec. 16 L.	+0.4	III	1903 Dec. 7 L.	+0.5	III	1905 Jan. 1 L.	34.35	III	1904 Dec. 19 L.	+0.7	III
19 L.	-0.5	III	9 L.	-0.9	III	4 L.	33.92	III	1905 Jan. 1 L.	+0.3	III
1906 Nov. 28 L.	-0.3	IV	11 L.	+0.1	III	Mean.....	-29 46 34.14		1906 Dec. 4 L.	+2.3	IV
Dec. 4 L.	+0.3	IV	14 L.	+0.1	III	Corr.	-0.65		11 L.	+0.9	IV
Mean.....	-0.02		15 L.	-0.2	III				Mean.....	+1.05	
Corr.	-0.52		16 L.	-0.3	III				Corr.	-0.65	
54 Ceti 1 ^h 45 ^m 34 ^s +10° 32' "			1904 Jan. 7 L.	+0.2	III	α Arietis 2 ^h 1 ^m 32 ^s +22° 59' 22".12			γ Trianguli 2 ^h 11 ^m 22 ^s +33° 23' 4".89		
1905 Dec. 19 L.	54.23	III	14 L.	+0.2	III	1899 Dec. 2 H.	+1.1	I	1905 Jan. 2 L.	-0.1	III
21 L.	53.19	III	Mean.....	+0.02		1904 Jan. 30 L.	-0.2	III	4 L.	+1.1	III
1906 Dec. 25 L.	53.52	IV	Corr.	-0.16		1906 Jan. 6 L.	-0.4	III	1906 Jan. 10 L.	+0.6	III
1907 Jan. 20 L.	53.09	IV				1907 Feb. 5 L.	-0.3	IV	1907 Jan. 20 L.	+0.8	IV
Mean.....	+10 32 53.51					6 L.	-0.2	IV	21 L.	+0.2	IV
Corr.	-0.29					Mean.....	0.00		Mean.....	+0.52	
2 Persei 1 ^h 45 ^m 48 ^s +50° 17' 54".35			1905 Dec. 12 L.	+0.3	III	Corr.	-0.13		Corr.	+0.01	
1905 Jan. 23 L.	+0.4	III	13 L.	+0.2	III						
27 L.	+0.9	III	Mean.....	+0.25							
1907 Jan. 21 L.	+0.3	IV	Corr.	-0.12							
Mean.....	+0.53					β Trianguli 2 ^h 3 ^m 35 ^s +34° 30' 51".45			67 Ceti 2 ^h 12 ^m 0 ^s -6° 52' 59".07		
Corr.	+0.25					1903 Dec. 7 L.	+1.0	III	1904 Jan. 27 L.	+2.0	III
ζ Ceti 1 ^h 46 ^m 31 ^s -10° 49' 44".45			1905 Jan. 18 L.	+0.2	III	15 L.	+0.1	III	30 L.	+1.8	III
1904 Dec. 20 L.	-1.0	III	20 L.	+0.6	III	1905 Dec. 30 L.	+0.3	III	Mean.....	+1.90	
21 L.	+0.2	III	Mean.....	+0.40		1907 Feb. 9 L.	+0.1	IV	Corr.	-0.48	
Mean.....	-0.40		Corr.	+0.52		11 L.	-0.2	IV			
Corr.	-0.51					Mean.....	+0.26				
ϵ Cassiopeia 1 ^h 47 ^m 12 ^s +63° 10' 39".62			1905 Jan. 16 L.	+0.1	III	Corr.	+0.03				
1904 Jan. 25 L.	0.0	III	19 L.	-0.1	III						
27 L.	-0.8	III	Mean.....	0.00		15 Arietis 2 ^h 5 ^m 5 ^s +19° 1' 42".62					
Mean.....	-0.40		Corr.	-0.83		1903 Dec. 31 L.	+1.0	III			
Corr.	+0.42					1904 Jan. 7 L.	+0.2	III			
α Trianguli 1 ^h 47 ^m 23 ^s +29° 5' 29".08			1905 Jan. 16 L.	+0.1	III	14 L.	+0.8	III			
1899 Dec. 2 H.	+1.0	I	19 L.	-0.1	III	Mean.....	+0.67				
1907 Feb. 6 L.	-0.2	IV	Mean.....	0.00		Corr.	-0.18				
7 L.	+0.4	IV	Corr.	-0.83							
8 L.	+0.8	IV				55 Cassiopeia 2 ^h 6 ^m 38 ^s +66° 3' 20".74					
Mean.....	+0.50					1905 Jan. 23 L.	-0.6	III			
Corr.	-0.04					27 L.	-0.7	III			
γ Arietis (south star) 1 ^h 48 ^m 5 ^s +18° 48' 12".18			1906 Dec. 12 L.	+0.5	IV	1907 Jan. 26 L.	-0.9	IV			
1906 Jan. 6 L.	-0.1	III	25 L.	+0.7	IV	28 L.	0.0	IV			
10 L.	+0.2	III	Mean.....	+0.38		Mean.....	-0.55				
Mean.....	+0.05		Corr.	-0.60		Corr.	+0.45				
Corr.	-0.18										
α Piscium (mean)* 1 ^h 50 ^m 52 ^s +2° 16' 50".80			1904 Dec. 16 L.	-0.3	III	55 Cassiopeia s. p. 2 ^h 6 ^m 38 ^s +66° 3' 20".74					
1904 Dec. 20 L.	+0.8	III	19 L.	-0.4	III	1905 Jan. 19 L.	+1.2	III			
21 L.	+1.5	III	1906 Dec. 4 L.	0.0	IV	28 L.	+1.1	III			
1907 Jan. 20 L.	+0.2	IV	11 L.	-0.2	IV	1907 Jan. 22 L.	+0.7	IV			
21 L.	+1.4	IV	Mean.....	-0.22		Feb. 8 L.	+1.3	IV			
Mean.....	+0.08		Corr.	+0.42		Mean.....	+1.08				
Corr.	-0.58					Corr.	-0.85				
6 Persei 2 ^h 6 ^m 57 ^s +50° 36' 3".72						κ Fornacis 2 ^h 17 ^m 58 ^s -24° 10' 14".90					
1905 Dec. 12 L.	+0.1	III				1903 Dec. 7 L.	+1.1	III			
13 L.	+0.4	III				11 L.	+2.4	III			
Mean.....	+0.25					14 L.	+1.1	III			
Corr.	+0.25					15 L.	+0.4	III			
Mean..... +0.05						31 L.	+1.8	III			
Corr. -0.18						1906 Jan. 18 L.	+2.2	III			
						1907 Jan. 28 L.	+1.2	IV			
						Mean.....	+1.46				
						Corr.	-0.61				

* The position in NEWCOMB'S Catalogue is for the south following component

ξ Arietis 2 ^h 19 ^m 27 ^s +10° 9' 27''.81		36 H. Cassiopeiae s. P. 2 ^h 28 ^m 31 ^s +72° 22' 51''.51		118 H ¹ . Cassiopeiae 2 ^h 36 ^m 13 ^s +67° 23' 59''.33		39 Arietis * 2 ^h 41 ^m 57 ^s +28° 49' 54''.12		
1904 Dec. 19 L.	+0.7 III	1905 Jan. 18 L.	+1.1 III	1905 Jan. 18 L.	-0.9 III	1899 Dec. 12 H.	+1.1 I	
1905 Jan. 1 L.	+0.9 III	19 L.	+2.1 III	20 L.	-0.5 III	1905 Jan. 2 L.	-0.3 III	
1907 Jan. 20 L.	+0.9 IV					4 L.	+0.2 III	
21 L.	+0.9 IV					1907 Jan. 21 L.	+0.3 IV	
Mean.....	+0.85	Mean.....	+1.60	Mean.....	-0.70	26 L.	-0.1 IV	
Corr.	-0.29	Corr.	-0.83	Corr.	+0.47	Mean.....	+0.24	
ϵ Cassiopeiae (brightest) 2 ^h 20 ^m 49 ^s +66° 57' 10''.53		128 H ¹ . Ceti 2 ^h 30 ^m 36 ^s +6° 24' 42''.19		118 H ¹ . Cassiopeiae s. P. 2 ^h 36 ^m 13 ^s +67° 23' 59''.33		Mean.....		+0.24
1905 Jan. 18 L.	-0.5 III	1904 Dec. 19 L.	0.0 III	1905 Jan. 16 L.	+0.2 III	Corr.	-0.05	
20 L.	+0.4 III	1905 Jan. 1 L.	+0.6 III	19 L.	-0.1 III	η Persei 2 ^h 43 ^m 24 ^s +55° 28' 50''.05		
1907 Feb. 5 L.	+0.4 IV	Mean.....	+0.30	Mean.....	+0.05	1905 Jan. 23 L.	-0.1 III	
8 L.	+1.1 IV	Corr.	-0.33	Corr.	-0.85	30 L.	-0.3 III	
Mean.....	+0.35					1906 Dec. 11 L.	+0.1 IV	
Corr.	+0.46					1907 Jan. 20 L.	+0.5 IV	
ϵ Cassiopeiae s. P. (brightest) 2 ^h 20 ^m 49 ^s +66° 57' 10''.53		ν Ceti 2 ^h 30 ^m 38 ^s +5° 9' 25''.19		μ Arietis 2 ^h 36 ^m 44 ^s +19° 35' "		Mean.....		+0.05
1905 Jan. 16 L.	+0.8 III	1899 Dec. 12 H.	+0.2 I	1905 Jan. 14 L.	8.28 III	Corr.	+0.32	
19 L.	+1.4 III	1905 Jan. 2 L.	-0.5 III	Feb. 4 L.	8.69 III	41 Arietis 2 ^h 44 ^m 6 ^s +26° 50' 53''.71		
1907 Jan. 30 L.	+1.1 IV	4 L.	-0.1 III	Mean.....	+19 35 8.48	1905 Dec. 21 L.	+0.1 III	
Feb. 8 L.	+1.4 IV	1907 Jan. 21 L.	-0.2 IV	Corr.	-0.17	1906 Jan. 29 L.	+0.8 III	
Mean.....	+1.18	26 L.	0.0 IV			1907 Feb. 9 L.	-0.5 IV	
Corr.	-0.85	Mean.....	-0.12			11 L.	-0.1 IV	
ρ Ceti 2 ^h 21 ^m 7 ^s -12° 44' 28''.65		ν Arietis 2 ^h 33 ^m 8 ^s +21° 31' 44''.46		θ Persei 2 ^h 37 ^m 22 ^s +48° 48' 19''.67		Mean.....		+0.08
1905 Jan. 2 L.	+0.4 III	1905 Dec. 19 L.	0.0 III	1905 Feb. 7 L.	+0.7 III	Corr.	-0.07	
4 L.	+1.7 III	30 L.	0.0 III	1907 Feb. 9 L.	-0.1 IV	β Fornacis 2 ^h 44 ^m 54 ^s -32° 49' 32''.18		
1906 Dec. 4 L.	+0.9 IV	1906 Dec. 11 L.	+0.6 IV	11 L.	+0.1 IV	1905 Jan. 14 L.	+0.9 III	
11 L.	+0.8 IV	1907 Jan. 20 L.	+0.5 IV	Mean.....	+0.23	Dec. 19 L.	0.0 III	
Mean.....	+0.95	Mean.....	+0.28	Corr.	+0.23	1907 Jan. 28 L.	+0.9 IV	
Corr.	-0.53	Corr.	-0.15			Feb. 5 L.	+0.2 IV	
ξ^2 Ceti 2 ^h 22 ^m 50 ^s +8° 0' 42''.95		142 H ¹ . Cephei 2 ^h 33 ^m 21 ^s +81° 1' "		35 Arietis 2 ^h 37 ^m 35 ^s +27° 16' 54''.04		Mean.....		+0.50
1903 Dec. 16 L.	-0.1 III	1905 Jan. 27 L.	28.26 III	1906 Jan. 5 L.	+0.8 III	Corr.	-0.66	
1904 Jan. 7 L.	+0.4 III	30 L.	27.62 III	18 L.	+0.8 III	σ Arietis 2 ^h 45 ^m 58 ^s +14° 40' 11''.92		
14 L.	+0.1 III	1907 Jan. 23 L.	28.04 IV	Mean.....	+0.80	1905 Jan. 27 L.	+0.3 III	
1907 Feb. 6 L.	-0.1 IV	28 L.	28.32 IV	Corr.	-0.07	Feb. 4 L.	+0.8 III	
7 L.	+0.7 IV	Mean.....	+81 1 28.06			Mean.....	+0.55	
Mean.....	+0.20	Corr.	+0.62			Corr.	-0.23	
Corr.	-0.31					τ^2 Eridani 2 ^h 46 ^m 30 ^s -21° 24' 57''.78		
27 Arietis 2 ^h 25 ^m 22 ^s +17° 15' 41''.29		142 H ¹ . Cephei s. P. 2 ^h 33 ^m 21 ^s +81° 1' "		γ Ceti 2 ^h 38 ^m 7 ^s +2° 48' 51''.15		1905 Dec. 30 L.		+0.8 III
1905 Dec. 12 L.	+0.5 III	1903 Apr. 27 H.	30.44 II	1906 Jan. 6 L.	-0.3 III	1906 Jan. 5 L.	+0.5 III	
13 L.	+0.7 III	June 4 E.	30.45 II	10 L.	+0.9 III	Mean.....	+0.65	
Mean.....	+0.60	23 E.	30.62 II	Feb. 9 L.	+0.7 IV	Corr.	-0.60	
Corr.	-0.20	1905 Jan. 28 L.	29.73 III	Dec. 4 L.	+0.4 IV	τ Persei 2 ^h 47 ^m 10 ^s +52° 21' 11''.99		
σ Ceti 2 ^h 27 ^m 21 ^s -15° 41' 0''.72		1907 Jan. 22 L.		Mean.....	+0.42	1903 Dec. 15 L.	-0.4 III	
1906 Jan. 5 L.	-0.3 III	30 L.	30.50 IV	Corr.	-0.38	16 L.	-0.8 III	
6 L.	-0.3 III	29.71 IV				31 L.	-0.4 III	
Mean.....	-0.30	Mean.....	+81 1 30.10			1904 Jan. 7 L.	+0.3 III	
Corr.	-0.55	Corr.	-0.77			14 L.	-0.3 III	
36 H. Cassiopeiae 2 ^h 28 ^m 31 ^s +72° 22' 51''.51		δ Ceti 2 ^h 34 ^m 21 ^s -0° 6' 9''.77		π Ceti 2 ^h 39 ^m 22 ^s -14° 16' 55''.66		1907 Feb. 12 L.		0.0 IV
1905 Jan. 20 L.	-0.1 III	1903 Dec. 15 L.	-0.3 III	1905 Dec. 12 L.	+0.7 III	13 L.	0.0 IV	
23 L.	-0.4 III	16 L.	-0.4 III	13 L.	+1.1 III	Mean.....	-0.23	
Mean.....	-0.25	31 L.	+0.5 III	Mean.....	+0.90	Corr.	+0.27	
Corr.	+0.53	1904 Jan. 14 L.	-0.4 III	Corr.	-0.54	μ Ceti 2 ^h 39 ^m 32 ^s +9° 41' 31''.30		
		1907 Feb. 5 L.	+0.7 IV			1904 Dec. 19 L.	-0.4 III	
		6 L.	+0.4 IV			1905 Jan. 1 L.	-0.2 III	
		Mean.....	+0.08			1907 Feb. 7 L.	+0.2 IV	
		Corr.	-0.41			8 L.	+0.2 IV	
						Mean.....	-0.05	
						Corr.	-0.30	

*The declination for 1900 in Newcomb's Catalogue requires a correction of $-9''.85$, and the proper motion requires a correction of $+0''.39$. These corrections have been applied.

γ Eridani $2^h 51^m 33^s -9^\circ 17' 46''.70$ 1903 Dec. 11 L. -0.4 III 1905 Jan. 2 L. +0.3 III Mean..... -0.05 Corr. -0.50		τ^3 Eridani $2^h 57^m 59^s -24^\circ 0' 58''.96$ 1905 Dec. 12 L. +0.2 III 1906 Jan. 13 L. 0.0 III 1906 Jan. 10 L. -0.4 III Mean..... -0.07 Corr. -0.61		94 Ceti $3^h 7^m 40^s -1^\circ 34' 12''.32$ 1905 Jan. 2 L. +0.3 III 1905 Jan. 14 L. +0.5 III 1906 Jan. 29 L. +0.6 III 1907 Jan. 20 L. -0.1 IV 1907 Jan. 21 L. +0.8 IV Mean..... +0.42 Corr. -0.42		τ^1 Arietis $3^h 15^m 27^s +20^\circ 47' 11''.71$ 1904 Dec. 19 L. +0.8 III 1905 Jan. 18 L. +0.3 III 1907 Feb. 13 L. +1.3 IV 1907 Feb. 14 L. +0.8 IV Mean..... +0.80 Corr. -0.16	
47 H. Cephei $2^h 52^m 47^s +79^\circ 1' 25''.10$ 1905 Jan. 23 L. -0.8 III 1905 Jan. 30 L. -1.4 III 1907 Feb. 8 L. -1.4 IV 1907 Feb. 9 L. -0.7 IV Mean..... -1.08 Corr. +0.60		ρ Persei $2^h 58^m 46^s +38^\circ 27' 9''.50$ 1905 Feb. 10 L. 0.0 III 1905 Feb. 14 L. +0.4 III 1907 Feb. 12 L. +0.4 IV 1907 Feb. 13 L. +0.9 IV Mean..... +0.42 Corr. +0.08		12 Eridani $3^h 7^m 49^s -29^\circ 22' 48''.61$ 1905 Jan. 18 L. +1.1 III 1905 Feb. 4 L. +2.4 III 1907 Feb. 12 L. +1.9 IV 1907 Feb. 13 L. +0.9 IV Mean..... +1.58 Corr. -0.64		α Persei $3^h 17^m 11^s +49^\circ 30' 19''.29$ 1899 Jan. 19 H. -0.4 I 22 H. +0.2 I 25 H. -0.2 I 30 H. +0.5 I 1904 Jan. 14 L. -0.5 III 1906 Jan. 29 L. -0.5 III 1907 Feb. 12 L. -0.2 IV 1907 Feb. 15 L. +0.3 IV Mean..... -0.10 Corr. +0.24	
47 H. Cephei s. p. $2^h 52^m 47^s +79^\circ 1' 25''.10$ 1905 Jan. 10 L. +0.8 III 1905 Jan. 28 L. +0.9 III 1907 Feb. 8 L. +0.7 IV 1907 Feb. 13 L. +0.8 IV Mean..... +0.80 Corr. -0.79		β Persei $3^h 1^m 40^s +40^\circ 34' 13''.81$ 1899 Jan. 19 H. -1.9 I 1905 Feb. 11 L. +0.3 III 1905 Feb. 17 L. -0.3 III 1907 Feb. 14 L. +0.5 IV 1907 Feb. 15 L. 0.0 IV Mean..... -0.28 Corr. +0.11		ζ Arietis $3^h 9^m 9^s +20^\circ 40' 25''.56$ 1903 Dec. 11 L. -1.7 III 1903 Dec. 14 L. +0.6 III 1906 Jan. 6 L. -0.4 III 1906 Jan. 10 L. +0.3 III 1907 Jan. 23 L. +0.5 IV 1907 Jan. 28 L. +0.4 IV Mean..... -0.05 Corr. -0.16		σ Tauri $3^h 19^m 26^s +8^\circ 40' 36''.99$ 1905 Jan. 20 L. -0.1 III 1905 Feb. 17 L. -0.8 III 1906 Feb. 9 L. -0.1 IV 1906 Feb. 15 L. -0.2 IV Mean..... -0.30 Corr. -0.31	
ϵ Arietis (mean) $2^h 53^m 30^s +20^\circ 56' 25''.57$ 1904 Dec. 19 L. +1.3 III 1905 Jan. 1 L. +1.6 III 1906 Feb. 9 L. +0.9 IV 1906 Feb. 13 L. +0.5 IV Mean..... +1.08 Corr. -0.15		ϵ Persei $3^h 1^m 51^s +49^\circ 13' 51''.55$ 1903 Dec. 31 L. +1.5 III 1904 Jan. 7 L. +0.8 III 1904 Jan. 14 L. -0.2 III 1907 Feb. 6 L. +0.8 IV 1907 Feb. 8 L. +0.5 IV Mean..... +0.68 Corr. +0.23		ζ Eridani $3^h 10^m 59^s -9^\circ 11' 27''.39$ 1905 Dec. 12 L. -0.1 III 1905 Dec. 13 L. +0.8 III 1907 Feb. 9 L. +0.2 IV 1907 Feb. 11 L. +0.5 IV Mean..... +0.35 Corr. -0.50		2 H. Camelopardalis $3^h 20^m 58^s +59^\circ 35' 30''.96$ 1905 Dec. 12 L. +0.5 III 1905 Dec. 13 L. -0.2 III 1907 Jan. 21 L. -0.4 IV 1907 Jan. 23 L. -0.9 IV Mean..... -0.25 Corr. +0.37	
λ Ceti $2^h 54^m 21^s +8^\circ 30' 32''.89$ 1899 Dec. 12 H. -1.0 I 1905 Jan. 4 L. -0.7 III 1905 Jan. 14 L. -1.4 III 1906 Jan. 6 L. -1.4 III 1907 Jan. 20 L. -0.5 IV 1907 Jan. 21 L. -0.4 IV Mean..... -0.90 Corr. -0.31		δ Arietis $3^h 5^m 55^s +19^\circ 20' 55''.02$ 1904 Dec. 19 L. -0.6 III 1905 Jan. 1 L. +0.1 III 1906 Feb. 9 L. 0.0 IV 1906 Feb. 15 L. -0.2 IV Mean..... -0.18 Corr. -0.17		1 H ¹ . Camelopardalis $3^h 11^m 11^s +65^\circ 17' ''$ 1905 Feb. 11 L. 12.23 III 1905 Feb. 14 L. 12.38 III 1907 Feb. 6 L. 11.47 IV 1907 Feb. 8 L. 11.23 IV Mean..... +65 17 11.83 Corr. +0.44		ξ Tauri $3^h 21^m 45^s +9^\circ 23' 2''.33$ 1903 Dec. 11 L. +1.1 III 14 L. +0.7 III 31 L. +0.5 III 1904 Jan. 7 L. +0.9 III 1907 Feb. 6 L. +1.0 IV 1907 Feb. 8 L. +1.2 IV Mean..... +0.90 Corr. -0.30	
α Ceti $2^h 57^m 3^s +3^\circ 41' 50''.65$ 1899 Jan. 30 H. +0.7 I 1905 Dec. 19 L. +0.4 III 1905 Dec. 21 L. +0.2 III 1907 Jan. 28 L. +0.7 IV 1907 Feb. 5 L. +0.6 IV Mean..... +0.52 Corr. -0.37		48 H. Cephei $3^h 7^m 37^s +77^\circ 22' 2''.36$ 1899 Jan. 30 H. [+1.8] I 1905 Jan. 20 L. -0.8 III 1905 Jan. 27 L. -0.7 III 1906 Feb. 13 L. -0.7 IV 1907 Feb. 5 L. -0.5 IV Mean..... -0.68 Corr. +0.58		1 H ¹ . Camelopardalis s. p. $3^h 11^m 11^s +65^\circ 17' ''$ 1905 Feb. 15 L. 12.66 III 1905 Feb. 17 L. 13.89 III 1907 Feb. 8 L. 12.39 IV 1907 Feb. 15 L. 12.49 IV Mean..... +65 17 12.86 Corr. -0.86		σ Persei $3^h 23^m 31^s +47^\circ 39' 0''.49$ 1905 Feb. 14 L. +0.3 III 1905 Feb. 18 L. -0.3 III 1907 Jan. 28 L. -0.1 IV 1907 Feb. 5 L. -0.3 IV Mean..... -0.10 Corr. +0.21	
γ Persei $2^h 57^m 33^s +53^\circ 6' 53''.90$ 1903 Dec. 14 L. -0.4 III 1903 Dec. 15 L. +0.9 III 1903 Dec. 16 L. +0.5 III 1905 Dec. 30 L. -0.2 III 1906 Jan. 5 L. -0.2 III 1907 Feb. 10 L. -0.4 IV 1907 Feb. 11 L. -0.1 IV Mean..... +0.01 Corr. +0.28		48 H. Cephei s. p. $3^h 7^m 37^s +77^\circ 22' 2''.36$ 1905 Jan. 19 L. +0.4 III 1905 Jan. 28 L. +0.9 III 1906 Feb. 14 L. +1.9 IV 1907 Jan. 30 L. +1.0 IV Mean..... +1.05 Corr. -0.80		κ Ceti $3^h 14^m 7^s +3^\circ 0' 13''.82$ 1905 Dec. 30 L. -0.3 III 1906 Jan. 5 L. +0.2 III Mean..... -0.05 Corr. -0.37		ς Tauri $3^h 24^m 56^s +10^\circ 59' 30''.05$ 1904 Jan. 25 L. +0.2 III 1905 Feb. 11 L. +0.6 III 1906 Jan. 6 L. +0.6 III 1907 Feb. 9 L. +0.7 IV 1907 Feb. 13 L. +0.6 IV Mean..... +0.54 Corr. -0.28	

f Tauri 3 ^h 25 ^m 21 ^s +12° 35' 38".73		149 H¹. Cephei s. p. 3 ^h 33 ^m 55 ^s +86° 19' "		v Persei 3 ^h 38 ^m 24 ^s +42° 15' 46".23		27 Tauri 3 ^h 43 ^m 13 ^s +23° 44' 51".52	
1905 Dec. 30 L.	+0.7 III	1902 July 16 H.	58.01 I	1906 Jan. 16 L.	-1.0 III	1905 Feb. 14 L.	+0.9 III
1906 Jan. 5 L.	+0.1 III	1903 May 28 H.	56.37 II	18 L.	-0.5 III	Dec. 12 L.	-0.1 III
10 L.	+0.2 III	June 15 E.	56.13 II	Feb. 19 L.	+0.3 IV	1906 Jan. 6 L.	+0.5 III
1907 Feb. 11 L.	+0.4 IV	18 E.	57.54 II	23 L.	0.0 IV	29 L.	+1.1 III
12 L.	+0.9 IV	July 8 H.	58.62 II	Mean.....	-0.30	Feb. 20 L.	+0.2 IV
18 L.	+0.3 IV	1905 Feb. 15 L.	57.85 III	Corr.	+0.14	22 L.	+0.3 IV
Mean.....	+0.43	17 L.	56.66 III			Mean.....	+0.48
Corr.	-0.26	1907 Feb. 8 L.	57.45 IV			Corr.	-0.12
		13 L.	56.75 IV				
		Mean.....	+86 19 57.26				
		Corr.	-0.74				
ε Eridani 3 ^h 28 ^m 13 ^s -9° 47' 47".61		11 Tauri 3 ^h 34 ^m 48 ^s +25° 0' 22".23		δ Eridani 3 ^h 38 ^m 27 ^s -10° 6' 2".39		τ⁷ Eridani 3 ^h 43 ^m 22 ^s -24° 11' 4".05	
1899 Jan. 19 H.	-1.3 I	1903 Jan. 31 E.	-0.4 II	1905 Jan. 18 L.	+1.5 III	1905 Jan. 27 L.	+0.5 III
1904 Dec. 19 L.	+0.3 III	Dec. 31 L.	+0.1 III	20 L.	+1.3 III	30 L.	+1.1 III
1905 Jan. 16 L.	+0.5 III	1904 Jan. 7 L.	+0.2 III	1907 Feb. 5 L.	+1.6 IV	1907 Jan. 28 L.	+1.4 IV
1907 Feb. 14 L.	+1.0 IV	14 L.	-0.4 III	9 L.	+1.2 IV	Feb. 13 L.	+1.3 IV
15 L.	+1.4 IV	Mean.....	-0.12	Mean.....	+1.40	Mean.....	+1.08
Mean.....	+0.38	Corr.	-0.10	Corr.	-0.51	Corr.	-0.61
Corr.	-0.50						

λ Tauri $3^h 55^m 8^s +12^\circ 12' 28''.30$ 1905 Feb. 7 L. -0.5 III 10 L. +0.4 III 1906 Feb. 20 L. -0.2 IV 22 L. +0.6 IV Mean..... +0.08 Corr. -0.26		174 G. Eridani $4^h 1^m 30^s -27^\circ 55' "$ 1905 Feb. 17 L. 29.81 III 1906 Jan. 18 L. 29.48 III 1907 Feb. 5 L. 28.92 IV 8 L. 29.02 IV Mean..... -27 55 29.31 Corr. -0.64		A Eridani $4^h 9^m 38^s -10^\circ 30' 16''.75$ 1904 Jan. 30 L. +0.3 III Feb. 3 L. +1.9 III 1907 Jan. 23 L. +0.3 IV 28 L. +0.5 IV Mean..... +0.52 Corr. -0.51		δ Tauri $4^h 17^m 10^s +17^\circ 18' 28''.87$ 1905 Mar. 2 L. +0.3 III 6 L. +0.6 III 1906 Feb. 28 L. +0.9 IV 1907 Feb. 10 L. -0.2 IV Mean..... +0.40 Corr. -0.20	
τ^0 Eridani $3^h 55^m 40^s -24^\circ 17' "$ 1903 Jan. 22 E. 57.93 II 23 E. 58.49 II 1905 Jan. 15 L. 59.12 III 16 L. 57.70 III 1906 Feb. 9 L. 59.13 IV 15 L. 57.89 IV Mean..... -24 17 58.38 Corr. -0.62		43 Tauri $4^h 3^m 20^s +19^\circ 20' 41''.04$ 1906 Jan. 5 L. +0.4 III 24 L. +1.0 III 1907 Feb. 10 L. +0.6 IV 11 L. +0.8 IV Mean..... +0.70 Corr. -0.17		μ Tauri $4^h 10^m 0^s +8^\circ 38' 31''.08$ 1903 Jan. 22 E. +0.6 II 23 E. -0.2 II 1904 Feb. 2 L. -1.7 III 1907 Feb. 18 L. 0.0 IV 22 L. -0.4 IV Mean..... -0.34 Corr. -0.31		68 Tauri $4^h 19^m 42^s +17^\circ 41' 56''.95$ 1903 Jan. 31 E. -0.1 II 1905 Feb. 26 L. +0.3 III 1906 Jan. 18 L. 0.0 III Feb. 9 L. -0.4 IV 13 L. +0.3 IV Mean..... +0.02 Corr. -0.20	
ν Tauri $3^h 57^m 50^s +5^\circ 42' 42''.98$ 1904 Jan. 25 L. 0.0 III 30 L. +0.6 III 1906 Feb. 24 L. -0.3 IV 26 L. +0.2 IV Mean..... +0.12 Corr. -0.34		p Tauri $4^h 4^m 44^s +26^\circ 13' 11''.93$ 1906 Jan. 28 L. 0.0 III 29 L. +0.2 III 1907 Feb. 15 L. +0.5 IV 23 L. +0.1 IV 25 L. +0.2 IV Mean..... +0.20 Corr. -0.08		o^2 Eridani $4^h 10^m 40^s -7^\circ 48' 46''.77$ 1903 Feb. 5 E. +0.7 II 1903 Dec. 31 L. +0.4 III 1904 Jan. 7 L. +0.6 III 14 L. +0.1 III 25 L. +0.2 III 1907 Feb. 5 L. +1.5 IV 8 L. +0.5 IV Mean..... +0.57 Corr. -0.48		o^5 Eridani $4^h 20^m 17^s -34^\circ 14' 56''.27$ 1905 Jan. 15 L. +1.7 III 16 L. +0.2 III 1906 Feb. 22 L. +2.0 IV 24 L. +0.7 IV Mean..... +1.15 Corr. -0.67	
A Tauri $3^h 58^m 47^s +21^\circ 48' 31''.34$ 1903 Dec. 11 L. -0.9 III 14 L. -1.2 III 31 L. +0.4 III 1904 Jan. 14 L. +0.1 III 1907 Jan. 23 L. -0.3 IV 28 L. +0.2 IV Mean..... -0.28 Corr. -0.14		151 H ¹ . Cephei $4^h 5^m 6^s +85^\circ 17' 29''.32$ 1905 Feb. 18 L. -1.2 III 24 L. -0.4 III 1907 Feb. 13 L. -1.3 IV 14 L. -1.9 IV Mean..... -1.20 Corr. +0.66		54 Persei $4^h 13^m 55^s +34^\circ 19' 31''.11$ 1905 Feb. 17 L. +0.2 III 28 L. +0.2 III 1906 Feb. 19 L. +0.1 IV 24 L. +0.8 IV Mean..... +0.32 Corr. +0.03		ϵ Tauri $4^h 22^m 47^s +18^\circ 57' 31''.27$ 1899 Jan. 25 H. +1.9 I 1903 Dec. 31 L. +0.5 III 1904 Jan. 7 L. +0.9 III 25 L. +0.5 III 1907 Feb. 14 L. +1.3 IV 18 L. +0.7 IV Mean..... +0.97 Corr. -0.18	
λ Persei $3^h 59^m 8^s +50^\circ 4' 47''.82$ 1903 Jan. 31 E. -0.8 II 1904 Feb. 2 L. +0.3 III Dec. 19 L. -0.8 III 1907 Feb. 13 L. -0.2 IV 14 L. -0.1 IV Mean..... -0.32 Corr. +0.24		151 H ¹ . Cephei S. P. $4^h 5^m 6^s +85^\circ 17' 29''.28$ 1903 May 28 H. +0.2 II June 21 H. +0.6 II July 2 H. -0.4 II 1905 Feb. 17 L. +0.2 III 23 L. +0.3 III 1907 Feb. 15 L. +0.5 IV 25 L. +0.2 IV Mar. 6 L. +0.6 IV Mean..... +0.28 Corr. -0.74		γ Tauri $4^h 14^m 6^s +15^\circ 23' 10''.39$ 1899 Jan. 22 H. -0.8 I 23 H. -0.2 I 1904 Feb. 6 L. -0.2 III 1905 Feb. 7 L. -0.4 III 1907 Feb. 21 L. -0.3 IV 25 L. +0.2 IV Mean..... -0.28 Corr. -0.23		ι Camelopardalis $4^h 24^m 6^s +53^\circ 41' 37''.49$ 1907 Jan. 28 L. -1.0 IV Feb. 5 L. -1.8 IV Mean..... -1.40 Corr. +0.29	
ψ Tauri $4^h 0^m 49^s +28^\circ 43' 51''.44$ 1905 Jan. 27 L. -0.3 III 30 L. -0.2 III 1907 Feb. 18 L. +0.2 IV 22 L. +0.5 IV Mean..... +0.05 Corr. -0.05		o^1 Eridani $4^h 6^m 59^s -7^\circ 5' 53''.01$ 1905 Jan. 15 L. 0.0 III 16 L. +0.3 III 1906 Feb. 9 L. +0.1 IV 15 L. +0.5 IV Mean..... +0.22 Corr. -0.48		o^4 Eridani $4^h 14^m 7^s -34^\circ 2' 32''.07$ 1903 Feb. 4 E. +0.1 II 6 E. +0.1 II 1906 Jan. 5 L. +0.7 III 16 L. -0.6 III 29 L. +1.4 III 1907 Feb. 15 L. +1.2 IV 23 L. +0.3 IV Mean..... +0.46 Corr. -0.67		80 Tauri $4^h 24^m 26^s +15^\circ 25' 10''.66$ 1905 Feb. 17 L. -0.3 III 1907 Feb. 8 L. -0.2 IV 13 L. -0.5 IV 25 L. -1.0 IV Mean..... -0.50 Corr. -0.22	
c Persei $4^h 1^m 24^s +47^\circ 26' 44''.00$ 1899 Jan. 25 H. +0.1 I 1905 Feb. 28 L. 0.0 III Mar. 2 L. 0.0 III 1906 Feb. 19 L. +0.3 IV 23 L. +0.4 IV Mean..... +0.16 Corr. +0.21		μ Persei $4^h 7^m 33^s +48^\circ 9' 18''.92$ 1905 Feb. 26 L. +0.4 III Mar. 6 L. +1.2 III 1906 Feb. 20 L. +0.7 IV 22 L. 0.0 IV Mean..... +0.58 Corr. +0.22		212 G. Eridani $4^h 10^m 17^s -20^\circ 52' "$ 1906 Jan. 24 L. 39.80 III 28 L. 40.08 III 1907 Feb. 11 L. 40.82 IV 13 L. 40.36 IV Mean..... -20 52 40.44 Corr. -0.59		m Persei $4^h 26^m 23^s +42^\circ 51' 1''.39$ 1905 Feb. 28 L. +0.2 III 1906 Jan. 5 L. +0.4 III Feb. 19 L. -0.4 IV 20 L. -0.3 IV Mean..... -0.02 Corr. +0.14	

<p>ρ Tauri 4^h 28^m 10^s +14° 38' 3".15</p> <p>1903 Jan. 22 E. +0.1 II Feb. 5 E. +0.1 II 1906 Jan. 16 L. +0.4 III 24 L. -0.1 III 1907 Feb. 10 L. -0.1 IV 11 L. 0.0 IV</p> <p>Mean..... +0.07 Corr. -0.23</p>		<p>258 G. Eridani 4^h 35^m 57^s -24° 40' "</p> <p>1903 Jan. 30 E. 38.70 II Feb. 6 E. 40.61 II 1907 Feb. 8 L. 39.45 IV 10 L. 39.88 IV</p> <p>Mean..... -24 40 39.66 Corr. -0.62</p>		<p>ι Tauri 4^h 45^m 31^s +18° 40' 10".90</p> <p>1905 Feb. 17 L. 0.0 III 18 L. +0.6 III 1906 Feb. 9 L. +0.5 IV 13 L. +0.2 IV</p> <p>Mean..... +0.32 Corr. -0.18</p>		<p>57 H¹. Camelopardalis 4^h 52^m 3^s +73° 55' "</p> <p>1905 Feb. 26 L. 9.64 III Mar. 2 L. 9.35 III 1907 Feb. 25 L. 9.52 IV 27 L. 9.78 IV</p> <p>Mean..... +73 55 9.57 Corr. +0.54</p>	
<p>α Tauri 4^h 30^m 11^s +16° 18' 29".28</p> <p>1899 Jan. 22 H. +0.7 I 23 H. +0.9 I 1905 Mar. 12 L. -0.2 III 1906 Jan. 28 L. -0.3 III 1907 Feb. 21 L. -0.2 IV 23 L. -0.1 IV</p> <p>Mean..... +0.13 Corr. -0.21</p>		<p>τ Tauri 4^h 36^m 15^s +22° 45' 54".46</p> <p>1906 Jan. 5 L. +0.7 III 16 L. +0.1 III 1907 Feb. 11 L. +0.3 IV 13 L. +0.4 IV</p> <p>Mean..... +0.38 Corr. -0.13</p>		<p>π^4 Orionis 4^h 45^m 53^s +5° 26' 3".04</p> <p>1903 Feb. 4 E. +1.1 II 5 E. +1.6 II 1906 Feb. 15 L. +0.5 IV 20 L. +0.4 IV</p> <p>Mean..... +0.90 Corr. -0.35</p>		<p>57 H¹. Camelopardalis s. p. 4^h 52^m 3^s +73° 55' "</p> <p>1905 Mar. 10 L. 11.42 III 12 L. 12.22 III 1907 Feb. 25 L. 10.43 IV Mar. 6 L. 11.10 IV 8 L. 10.27 IV</p> <p>Mean..... +73 55 11.09 Corr. -0.82</p>	
<p>ν Eridani 4^h 31^m 19^s -3° 33' 24".43</p> <p>1904 Feb. 23 L. +0.4 III 1906 Feb. 15 L. +0.4 IV 26 L. +1.4 IV</p> <p>Mean..... +0.73 Corr. -0.44</p>		<p>4 Camelopardalis 4^h 39^m 40^s +56° 34' 46".00</p> <p>1904 Feb. 3 L. -0.7 III 23 L. -0.6 III 1907 Jan. 28 L. -0.3 IV Feb. 5 L. -0.2 IV</p> <p>Mean..... -0.45 Corr. +0.33</p>		<p>σ^1 Orionis 4^h 46^m 52^s +14° 5' 2".67</p> <p>1903 Jan. 30 E. -1.6 II Feb. 6 E. -0.8 II 1904 Jan. 30 L. -0.6 III Feb. 2 L. -0.8 III 1906 Feb. 22 L. -0.5 IV 24 L. -0.5 IV</p> <p>Mean..... -0.80 Corr. -0.24</p>		<p>10 Camelopardalis 4^h 54^m 31^s +60° 17' 46".25</p> <p>1904 Feb. 24 L. -0.1 III 27 L. -0.9 III 1906 Feb. 28 L. -0.8 IV Mar. 2 L. -0.6 IV</p> <p>Mean..... -0.60 Corr. +0.38</p>	
<p>ν^7 Eridani 4^h 31^m 40^s -30° 46' 1".64</p> <p>1903 Feb. 4 E. +1.3 II 9 E. +2.1 II 1905 Jan. 15 L. +0.9 III 16 L. -0.2 III 1906 Feb. 9 L. +0.3 IV 13 L. +0.2 IV</p> <p>Mean..... +0.77 Corr. -0.65</p>		<p>μ Eridani 4^h 40^m 30^s -3° 26' 16".26</p> <p>1905 Feb. 10 L. -0.3 III 28 L. -0.6 III 1906 Feb. 28 L. +0.9 IV Mar. 2 L. +0.6 IV</p> <p>Mean..... +0.15 Corr. -0.44</p>		<p>π^5 Orionis 4^h 49^m 3^s +2° 16' 37".55</p> <p>1903 Dec. 31 L. +0.4 III 1904 Jan. 7 L. +0.6 III 14 L. +0.2 III 1907 Feb. 14 L. 0.0 IV 15 L. +0.4 IV</p> <p>Mean..... +0.32 Corr. -0.38</p>		<p>ϵ Aurigæ 4^h 54^m 48^s +43° 40' 31".46</p> <p>1905 Feb. 17 L. +0.5 III Mar. 6 L. +0.3 III 1907 Feb. 21 L. -0.1 IV 23 L. +0.2 IV</p> <p>Mean..... +0.22 Corr. +0.16</p>	
<p>53 Eridani 4^h 33^m 36^s -14° 29' 58".46</p> <p>1903 Dec. 31 L. +0.7 III 1904 Jan. 7 L. +1.2 III 14 L. +1.6 III 1906 Feb. 22 L. +1.3 IV 24 L. +1.1 IV</p> <p>Mean..... +1.18 Corr. -0.54</p>		<p>9 Camelopardalis 4^h 44^m 6^s +66° 10' 22".59</p> <p>1899 Jan. 22 H. +0.6 I 23 H. +0.9 I 1905 Feb. 26 L. -0.3 III Mar. 2 L. -0.2 III 1906 Feb. 23 L. -0.4 IV 26 L. -0.5 IV</p> <p>Mean..... +0.02 Corr. +0.45</p>		<p>π^1 Orionis 4^h 49^m 23^s +9° 59' "</p> <p>1903 Feb. 9 E. 30.79 II 12 E. 30.24 II 1904 Feb. 6 L. 30.85 III 1907 Feb. 11 L. 29.73 IV 13 L. 30.19 IV</p> <p>Mean..... +9 59 30.36 Corr. -0.29</p>		<p>ζ Aurigæ 4^h 55^m 29^s +40° 55' 47".90</p> <p>1899 Mar. 11 H. +0.6 I 1905 Feb. 10 L. +0.1 III 14 L. +0.3 III 1906 Feb. 19 L. -0.5 IV Mar. 5 L. -0.1 IV</p> <p>Mean..... +0.08 Corr. +0.12</p>	
<p>35 B. Camelopardalis 4^h 35^m 22^s +75° 45' 32".37</p> <p>1904 Jan. 30 L. +0.5 III Feb. 6 L. +0.4 III 1907 Feb. 18 L. +0.3 IV 22 L. -0.3 IV</p> <p>Mean..... +0.22 Corr. +0.56</p>		<p>9 Camelopardalis s. p. 4^h 44^m 6^s +66° 10' 22".60</p> <p>1905 Feb. 26 L. +1.3 III Mar. 2 L. +1.0 III 1906 Feb. 22 L. +1.2 IV 25 L. 0.0 IV</p> <p>Mean..... +0.88 Corr. -0.85</p>		<p>ι Aurigæ 4^h 50^m 29^s +33° 0' 28".12</p> <p>1905 Feb. 28 L. 0.0 III Mar. 12 L. -0.1 III 1907 Feb. 18 L. +0.2 IV 22 L. -0.2 IV</p> <p>Mean..... -0.02 Corr. +0.01</p>		<p>157 H¹. Cephei 4^h 56^m 18^s +85° 49' "</p> <p>1903 Feb. 6 E. 44.89 II 12 E. 45.69 II 1904 Feb. 11 L. 44.75 III 15 L. 44.82 III 1906 Feb. 15 L. 44.63 IV 16 L. 44.88 IV</p> <p>Mean..... +85 49 44.94 Corr. +0.67</p>	
<p>35 B. Camelopardalis s. p. 4^h 35^m 22^s +75° 45' 32".28</p> <p>1905 Apr. 24 L. +1.2 III 30 L. +2.4 III 1907 Mar. 8 L. +1.8 IV 15 L. +0.6 IV</p> <p>Mean..... +1.50 Corr. -0.81</p>		<p>π^3 Orionis 4^h 44^m 25^s +6° 47' 12".75</p> <p>1903 Jan. 23 E. -0.5 II 1905 Feb. 24 L. +0.4 III Mar. 6 L. +0.7 III 1907 Feb. 21 L. 0.0 IV 23 L. +0.1 IV</p> <p>Mean..... +0.14 Corr. -0.33</p>		<p>k Tauri 4^h 52^m 2^s +24° 53' 45".13</p> <p>1905 Jan. 15 L. -0.2 III 16 L. +0.5 III 1907 Feb. 8 L. +0.2 IV 10 L. +0.6 IV</p> <p>Mean..... +0.28 Corr. -0.10</p>		<p>157 H¹. Cephei s. p. 4^h 56^m 18^s +85° 49' "</p> <p>1903 Aug. 17 H. 47.19 II 1905 June 26 L. 47.38 III 27 L. 47.25 III</p> <p>Mean..... +85 49 47.27 Corr. -0.74</p>	

ϵ Tauri		
4 ^h 57 ^m 7 ^s	+21° 26' 49".41	
1904 Feb. 20 L.	+0.7	III
22 L.	+0.8	III
1906 Feb. 9 L.	+0.8	IV
13 L.	+0.4	IV
Mean.....	+0.68	
Corr.	-0.15	

η Orionis		
4 ^h 58 ^m 51 ^s	+15° 15' 53".62	
1898 Oct. 9 H.	-0.3	I
1904 Jan. 30 L.	0.0	III
1906 Feb. 20 L.	+0.1	IV
22 L.	+0.1	IV
Mean.....	-0.02	
Corr.	-0.23	

γ Aurigæ		
4 ^h 59 ^m 30 ^s	+41° 5' 57".07	
1905 Feb. 28 L.	-0.2	III
Mar. 12 L.	-0.1	III
1906 Feb. 24 L.	+0.1	IV
Mar. 6 L.	+0.4	IV
Mean.....	+0.05	
Corr.	+0.12	

ϵ Leporis		
5 ^h 1 ^m 13 ^s	-22° 30' 19".46	
1904 Feb. 6 L.	+0.5	III
1907 Feb. 10 L.	+1.0	IV
13 L.	+1.4	IV
Mean.....	+0.97	
Corr.	-0.60	

β Eridani		
5 ^h 2 ^m 56 ^s	-5° 12' 56".46	
1899 Mar. 11 H.	-0.4	I
1904 Jan. 7 L.	-0.1	III
25 L.	+0.1	III
1907 Feb. 14 L.	+1.1	IV
15 L.	+1.3	IV
Mean.....	+0.40	
Corr.	-0.46	

λ Eridani		
5 ^h 4 ^m 22 ^s	-8° 52' 56".20	
1905 Feb. 17 L.	+1.2	III
18 L.	+1.1	III
1906 Feb. 28 L.	+0.8	IV
Mar. 2 L.	+1.5	IV
Mean.....	+1.15	
Corr.	-0.50	

η H. Camelopardalis		
5 ^h 6 ^m 4 ^s	+79° 7' 0".07	
1904 Feb. 24 L.	-0.7	III
27 L.	-0.7	III
1907 Feb. 27 L.	+0.1	IV
Mar. 2 L.	-0.7	IV
5 L.	-0.2	IV
Mean.....	-0.44	
Corr.	+0.60	

η H. Camelopardalis S. P.		
5 ^h 6 ^m 4 ^s	+79° 7' 0".12	
1905 Apr. 30 L.	+2.0	III
May 7 L.	+1.4	III
1907 Mar. 8 L.	+0.1	IV
15 L.	+1.7	IV
Mean.....	+1.30	
Corr.	-0.79	

μ Aurigæ		
5 ^h 6 ^m 35 ^s	+38° 21' 57".54	
1905 Jan. 15 L.	0.0	III
16 L.	-0.9	III
1906 Feb. 19 L.	-0.5	IV
26 L.	-1.0	IV
Mean.....	-0.60	
Corr.	+0.08	

μ Leporis		
5 ^h 8 ^m 26 ^s	-16° 19' 25".59	
1903 Jan. 22 E.	+0.2	II
23 E.	-0.3	II
1905 Mar. 2 L.	+0.7	III
6 L.	+1.2	III
1906 Feb. 9 L.	+0.8	IV
13 L.	+0.4	IV
Mean.....	+0.50	
Corr.	-0.56	

α Aurigæ		
5 ^h 9 ^m 18 ^s	+45° 53' 46".58	
1898 Mar. 1 H.	-0.1	I
3 H.	-0.8	I
7 H.	-0.7	I
9 H.	+0.6	I
19 H.	+1.1	I
Sept. 16 H.	0.0	I
23 H.	+1.1	I
1905 Mar. 11 L.	-0.2	III
16 L.	-0.1	III
1907 Feb. 25 L.	+0.2	IV
Mar. 4 L.	-0.1	IV
Mean.....	+0.09	
Corr.	+0.19	

β Orionis		
5 ^h 9 ^m 44 ^s	-8° 19' 1".40	
1898 Sept. 28 H.	-1.5	I
29 H.	-0.9	I
Oct. 9 H.	-1.8	I
1899 Jan. 23 H.	-1.5	I
1905 Mar. 12 L.	+0.3	III
13 L.	+0.2	III
1906 Feb. 20 L.	+0.1	IV
Mar. 6 L.	+0.4	IV
Mean.....	-0.59	
Corr.	-0.49	

λ Aurigæ		
5 ^h 12 ^m 6 ^s	+40° 8' 33".29	
1905 Feb. 10 L.	-0.6	III
14 L.	+0.1	III
1906 Feb. 15 L.	-0.3	IV
16 L.	-0.3	IV
Mean.....	-0.28	
Corr.	+0.11	

τ Orionis		
5 ^h 12 ^m 45 ^s	-6° 57' 8".57	
1899 Feb. 24 H.	+0.1	I
Mar. 10 H.	-0.1	I
1905 Feb. 18 L.	+0.7	III
28 L.	+0.4	III
1907 Feb. 22 L.	+0.6	IV
23 L.	+0.9	IV
Mean.....	+0.43	
Corr.	-0.48	

σ Columbæ		
5 ^h 13 ^m 53 ^s	-34° 59' 36".65	
1903 Feb. 6 E.	+1.1	II
9 E.	+0.5	II
1904 Feb. 22 L.	+0.3	III
1906 Feb. 22 L.	+1.6	IV
Mar. 5 L.	+1.6	IV
Mean.....	+1.02	
Corr.	-0.67	

λ Leporis		
5 ^h 14 ^m 58 ^s	-13° 16' 47".60	
1903 Feb. 12 E.	+0.9	II
1904 Feb. 11 L.	+0.9	III
15 L.	-0.1	III
1907 Feb. 14 L.	-0.2	IV
15 L.	+1.1	IV
Mean.....	+0.52	
Corr.	-0.53	

η G. Columbæ		
5 ^h 15 ^m 25 ^s	-27° 28' "	
1904 Jan. 25 L.	17.83	III
1907 Feb. 10 L.	16.83	IV
13 L.	17.19	IV
Mean.....	-27 28 17.28	
Corr.	-0.63	

σ Orionis		
5 ^h 16 ^m 39 ^s	-0° 28' 51".79	
1903 Jan. 30 E.	+0.2	II
1904 Feb. 6 L.	+0.4	III
1907 Feb. 18 L.	+0.3	IV
21 L.	-0.1	IV
Mean.....	+0.20	
Corr.	-0.41	

η Orionis (mean)		
5 ^h 19 ^m 27 ^s	-2° 29' 20".56	
1905 Feb. 4 L.	+0.9	III
10 L.	+0.2	III
1906 Feb. 20 L.	+0.5	IV
23 L.	+1.4	IV
Mean.....	+0.75	
Corr.	-0.43	

σ Orionis		
5 ^h 19 ^m 33 ^s	+1° 45' 17".11	
1903 Jan. 23 E.	+0.3	II
1904 Feb. 24 L.	+1.2	III
Mar. 1 L.	+1.3	III
1906 Feb. 24 L.	+0.5	IV
Mar. 2 L.	+1.1	IV
Mean.....	+0.88	
Corr.	-0.39	

γ Orionis		
5 ^h 19 ^m 40 ^s	+0° 15' 32".92	
1904 Mar. 2 L.	+0.1	III
5 L.	+0.6	III
1906 Mar. 6 L.	+0.3	IV
17 L.	+0.2	IV
Mean.....	+0.30	
Corr.	-0.34	

β Tauri		
5 ^h 19 ^m 58 ^s	+28° 31' 23".03	
1898 Mar. 3 H.	-0.4	I
5 H.	-0.1	I
7 H.	+0.5	I
9 H.	+1.4	I
19 H.	+0.4	I
Sept. 16 H.	-0.2	I
23 H.	-1.2	I
26 H.	-0.6	I
28 H.	-1.7	I
29 H.	-1.1	I
Oct. 9 H.	-1.4	I
16 H.	-1.0	I
1899 Jan. 23 H.	-0.3	I
1905 Feb. 14 L.	+0.6	III
17 L.	-0.4	IV
1907 Feb. 25 L.	+0.6	IV
27 L.	+0.6	IV
Mean.....	-0.25	
Corr.	-0.05	

η Camelopardalis		
5 ^h 20 ^m 43 ^s	+62° 59' 1".35	
1905 Jan. 15 L.	+0.1	III
16 L.	+0.3	III
1906 Feb. 9 L.	-0.3	IV
13 L.	0.0	IV
Mean.....	+0.02	
Corr.	+0.41	

β Leporis		
5 ^h 23 ^m 58 ^s	-20° 50' 21".06	
1905 Feb. 24 L.	-0.3	III
26 L.	+0.9	III
1907 Feb. 14 L.	+1.0	IV
15 L.	+0.6	IV
Mean.....	+0.55	
Corr.	-0.59	

η Camelopardalis		
5 ^h 24 ^m 0 ^s	+57° 9' "	
1903 Feb. 5 E.	2.42	II
6 E.	1.74	II
9 E.	1.23	II
1906 Feb. 15 L.	0.34	IV
16 L.	0.27	IV
Mean.....	+57 9 1.20	
Corr.	+0.34	

γ Aurigæ		
5 ^h 26 ^m 13 ^s	+32° 7' 5".25	
1899 Feb. 24 H.	+0.4	I
1905 Feb. 18 L.	+0.9	III
28 L.	-0.1	III
1906 Feb. 19 L.	+0.2	IV
Mar. 10 L.	+0.4	IV
Mean.....	+0.36	
Corr.	0.00	

74 B. Camelopardalis
5^h 26^m 21^s +74° 58' 40".05

1904 Feb. 20 L.	+0.5	III
22 L.	-0.8	III
1907 Mar. 2 L.	0.0	IV
5 L.	+0.8	IV
Mean.....	+0.12	
Corr.	+0.56	

74 B. Camelopardalis S. P.
5^h 26^m 21^s +74° 58' 40".06

1905 Apr. 24 L.	+1.3	III
30 L.	+1.2	III
1907 Mar. 15 L.	+1.1	IV
19 L.	-0.6	IV
Mean.....	+0.75	
Corr.	-0.81	

δ Orionis
5^h 26^m 54^s -0° 22' 23".07

1899 Mar. 10 H.	+0.1	I
1905 Mar. 11 L.	+0.7	III
15 L.	+0.5	III
1907 Feb. 22 L.	+0.7	IV
23 L.	+0.6	IV
Mean.....	+0.52	
Corr.	-0.41	

19 Camelopardalis
5^h 27^m 34^s +64° 5' "

1903 Feb. 12 E.	22.04	II
1904 Feb. 3 L.	22.37	III
11 L.	22.04	III
1906 Feb. 22 L.	21.84	IV
26 L.	22.41	IV
Mean.....	+64 5	
Corr.	22.14	
	+0.43	

α Leporis
5^h 28^m 19^s -17° 53' 37".65

1905 Mar. 12 L.	+1.4	III
13 L.	+1.1	III
1907 Mar. 4 L.	+2.3	IV
9 L.	+1.7	IV
Mean.....	+1.62	
Corr.	-0.57	

φ¹ Orionis
5^h 29^m 20^s +9° 25' 18".74

1905 Feb. 4 L.	+1.3	III
10 L.	+0.4	III
1906 Feb. 28 L.	+1.1	IV
Mean.....	+0.93	
Corr.	-0.30	

158 H¹. Cephei
5^h 29^m 54^s +85° 8' 49".58

1904 Feb. 6 L.	+0.1	III
24 L.	-0.6	III
1907 Feb. 21 L.	-0.2	IV
Mar. 6 L.	-1.2	IV
Mean.....	-0.18	
Corr.	+0.66	

158 H¹. Cephei S. P.
5^h 29^m 54^s +85° 8' 49".58

1903 Aug. 17 H.	+1.3	II
24 H.	+0.3	II
1905 June 14 L.	+1.3	III
26 L.	+1.1	III
1907 Mar. 26 L.	+0.4	IV
29 L.	+2.0	IV

Mean.....	+1.07	
Corr.	-0.74	

θ¹ Orionis
5^h 30^m 22^s -5° 27' 20".25

1904 Feb. 27 L.	-0.2	III
Mar. 1 L.	+0.8	III
1907 Feb. 10 L.	+0.4	IV
13 L.	+0.4	IV
Mean.....	+0.35	
Corr.	-0.46	

θ² Orionis
5^h 30^m 28^s -5° 28' 54".10

1905 Jan. 15 L.	-0.1	III
16 L.	+0.3	III
1907 Feb. 25 L.	+0.9	IV
27 L.	0.0	IV
Mean.....	+0.28	
Corr.	-0.46	

ζ Orionis
5^h 30^m 32^s -5° 58' 31".71

1905 Feb. 14 L.	+1.2	III
17 L.	0.0	III
1906 Feb. 20 L.	+0.4	IV
23 L.	+0.6	IV
Mean.....	+0.55	
Corr.	-0.47	

22 Camelopardalis
5^h 30^m 39^s +56° 18' "

1903 Jan. 30 E.	10.37	II
1904 Jan. 25 L.	10.13	III
30 L.	10.88	III
1906 Feb. 24 L.	8.90	IV
Mar. 2 L.	8.78	IV
5 L.	9.02	IV

Mean.....	+56 18	
Corr.	9.68	
	+0.33	

ε Orionis
5^h 31^m 8^s -1° 15' 56".39

1898 Mar. 5 H.	-1.2	I
7 H.	-0.1	I
Sept. 26 H.	-0.6	I
28 H.	-0.5	I
29 H.	-0.5	I
Oct. 16 H.	-0.5	I
1899 Jan. 23 H.	-0.9	I
1904 Feb. 23 L.	-0.4	III
Mar. 2 L.	0.0	III
1906 Mar. 17 L.	+0.1	IV
18 L.	+0.4	IV

Mean.....	-0.38	
Corr.	-0.42	

ζ Tauri
5^h 31^m 40^s +21° 4' 53".49

1905 Feb. 24 L.	+0.9	III
26 L.	+0.1	III
1906 Feb. 9 L.	+0.1	IV
13 L.	+0.2	IV
Mean.....	+0.32	
Corr.	-0.15	

σ Orionis
5^h 33^m 44^s -2° 39' 27".66

1907 Feb. 18 L.	+1.2	IV
Mar. 11 L.	+1.4	IV
Mean.....	+1.30	
Corr.	-0.43	

23 Camelopardalis
5^h 34^m 57^s +61° 25' "

1903 Jan. 23 E.	37.66	II
Feb. 4 E.	36.22	II
5 E.	35.71	II
1904 Mar. 4 L.	36.19	III
1907 Feb. 14 L.	36.22	IV
15 L.	37.18	IV
Mean.....	+61 25	
Corr.	36.53	
	+0.39	

ζ Orionis
5^h 35^m 43^s -1° 59' 43".72

1903 Feb. 6 E.	0.0	II
9 E.	+1.1	II
1904 Mar. 5 L.	+0.3	III
9 L.	-1.4	III
1907 Mar. 4 L.	+0.9	IV
9 L.	+1.2	IV
Mean.....	+0.35	
Corr.	-0.43	

α Columbae
5^h 36^m 2^s -34° 7' 38".71

1905 Mar. 12 L.	+1.7	III
13 L.	+2.1	III
1907 Feb. 22 L.	+2.7	IV
23 L.	+2.5	IV
Mean.....	+2.25	
Corr.	-0.67	

ο Aurigae
5^h 38^m 9^s +49° 46' 57".14

1905 Feb. 17 L.	+0.4	III
18 L.	+0.5	III
1907 Feb. 10 L.	-0.1	IV
13 L.	+0.5	IV
Mean.....	+0.32	
Corr.	+0.24	

γ Leporis
5^h 40^m 18^s -22° 28' 52".07

1904 Feb. 20 L.	+0.1	III
22 L.	-1.2	III
1906 Feb. 20 L.	-0.9	IV
24 L.	-0.7	IV
Mean.....	-0.68	
Corr.	-0.60	

130 Tauri
5^h 41^m 36^s +17° 41' 29".95

1904 Feb. 11 L.	+0.3	III
1906 Feb. 28 L.	+0.3	IV
Mar. 2 L.	+0.4	IV
Mean.....	+0.33	
Corr.	-0.20	

ζ Leporis
5^h 42^m 25^s -14° 51' 32".85

1904 Feb. 27 L.	+0.7	III
Mar. 1 L.	+1.6	III
1906 Feb. 9 L.	+0.5	IV
16 L.	+0.7	IV
Mean.....	+0.88	
Corr.	-0.55	

κ Orionis
5^h 43^m 1^s -9° 42' 18".25

1899 Feb. 24 H.	0.0	I
1904 Jan. 30 L.	+0.7	III
Feb. 2 L.	+1.7	III
1906 Mar. 17 L.	+0.5	IV
18 L.	+0.9	IV
Mean.....	+0.76	
Corr.	-0.50	

ν Aurigae
5^h 44^m 34^s +39° 7' 9".46

1904 Feb. 15 L.	+0.6	III
24 L.	+0.4	III
1906 Feb. 19 L.	+0.3	IV
26 L.	+0.3	IV
Mean.....	+0.40	
Corr.	+0.09	

ξ Aurigae
5^h 46^m 28^s +55° 41' 1".78

1903 Jan. 22 E.	+0.1	II
30 E.	-0.4	II
Feb. 12 E.	-0.4	II
1905 Feb. 10 L.	-0.4	III
14 L.	-0.4	III
1907 Feb. 18 L.	-0.6	IV
22 L.	-0.9	IV
Mean.....	-0.43	
Corr.	+0.32	

δ Leporis
5^h 47^m 1^s -20° 53' 18".99

1904 Mar. 5 L.	+1.2	III
1907 Feb. 14 L.	+2.4	IV
15 L.	+1.3	IV
Mean.....	+1.63	
Corr.	-0.59	

α Orionis
5^h 49^m 45^s +7° 23' 18".65

1898 Sept. 26 H.	+0.3	I
28 H.	+0.2	I
29 H.	+0.2	I
1904 Mar. 2 L.	-0.1	III
9 L.	-0.5	III
1907 Mar. 2 L.	+0.3	IV
4 L.	+0.1	IV
5 L.	+0.3	IV
Mean.....	+0.10	
Corr.	-0.32	

δ Aurigæ
5^h 51^m 18^s +54° 16' 37".11

1905 Feb. 24 L.	-0.8	III
26 L.	-0.8	III
1906 Mar. 18 L.	-1.4	IV
21 L.	-0.9	IV

Mean..... -0.98
Corr. +0.30

139 Tauri
5^h 51^m 47^s +25° 56' "

1903 Jan. 23 E.	28.40	II
Feb. 4 E.	29.50	II
1905 Feb. 17 L.	30.05	III
18 L.	29.64	III
1906 Mar. 2 L.	29.96	IV
5 L.	29.66	IV

Mean..... +25 56 29.54
Corr. -0.09

7 Leporis
5^h 51^m 51^s -14° 11' 8".41

1905 Mar. 2 L.	+1.2	III
6 L.	+1.8	III
1906 Feb. 20 L.	+0.7	IV
24 L.	+0.6	IV

Mean..... +1.08
Corr. -0.54

99 B. Camelopardalis
5^h 51^m 56^s +66° 53' "

1903 Feb. 5 E.	34.35	II
6 E.	34.89	II
1904 Feb. 22 L.	33.97	III
Mar. 1 L.	33.45	III
1907 Mar. 6 L.	34.81	IV
11 L.	34.63	IV
15 L.	34.68	IV

Mean..... +66 53 34.40
Corr. +0.46

β Aurigæ
5^h 52^m 12^s +44° 56' 14".61

1898 Sept. 16 H.	+0.6	I
1905 Mar. 11 L.	+1.1	III
15 L.	0.0	III
1907 Feb. 25 L.	-0.4	IV
27 L.	-0.4	IV

Mean..... +0.18
Corr. +0.17

θ Aurigæ
5^h 52^m 54^s +37° 12' 20".31

1898 Mar. 3 H.	-1.7	I
9 H.	-0.9	I
12 H.	-0.8	I
13 H.	-1.0	I
14 H.	+0.1	I
1899 Mar. 1 H.	-0.3	I
10 H.	+1.0	I
1905 Mar. 12 L.	+0.7	III
13 L.	0.0	III
1906 Feb. 16 L.	-0.1	IV
19 L.	+0.4	IV

Mean..... -0.24
Corr. +0.07

μ Orionis
5^h 56^m 53^s +9° 38' 49".38

1903 Feb. 9 E.	+1.7	II
12 E.	+0.6	II
1904 Feb. 15 L.	+1.3	III
1906 Feb. 26 L.	+1.5	IV
28 L.	+1.8	IV

Mean..... +1.38
Corr. -0.30

1 Geminorum
5^h 58^m 2^s +23° 16' 7".02

1903 Jan. 22 E.	-0.1	II
30 E.	+0.3	II
1904 Jan. 25 L.	-0.1	III
30 L.	+0.2	III
1907 Feb. 18 L.	+0.3	IV
22 L.	+1.2	IV

Mean..... +0.30
Corr. -0.12

66 Orionis
5^h 59^m 41^s +4° 9' 51".50

1904 Feb. 20 L.	+1.5	III
1907 Feb. 14 L.	+0.6	IV
15 L.	+0.7	IV

Mean..... +0.93
Corr. -0.36

ν Orionis
6^h 1^m 52^s +14° 46' 49".61

1899 Mar. 10 H.	+0.1	I
1904 Mar. 4 L.	+0.3	III
5 L.	+0.4	III
1906 Feb. 9 L.	-0.9	IV
20 L.	+0.3	IV

Mean..... +0.04
Corr. -0.23

74 G. Columbæ
6^h 2^m 15^s -29° 44' "

1903 Feb. 5 E.	49.77	II
6 E.	50.77	II
1905 Feb. 17 L.	50.16	III
18 L.	49.74	III
1906 Feb. 16 L.	50.13	IV
24 L.	51.21	IV

Mean..... -29 44 50.30
Corr. -0.65

36 Camelopardalis
6^h 2^m 47^s +65° 44' 17".53

1905 Mar. 11 L.	-0.1	III
12 L.	+0.2	III

Mean..... +0.05
Corr. +0.45

36 Camelopardalis s. p.
6^h 2^m 47^s +65° 44' 17".53

1905 Apr. 20 L.	+0.8	III
24 L.	+1.9	III

Mean..... +1.35
Corr. -0.85

ξ Orionis
6^h 6^m 15^s +14° 13' 52".51

1903 Feb. 4 E.	-0.2	II
1904 Feb. 27 L.	+0.3	III
Mar. 1 L.	+0.4	III
1907 Feb. 25 L.	-0.2	IV
27 L.	+0.4	IV

Mean..... +0.14
Corr. -0.24

22 H. Camelopardalis
6^h 7^m 50^s +69° 21' 17".75

1905 Mar. 13 L.	-0.3	III
15 L.	-0.6	III
1906 Sept. 24 L.	-0.4	IV
Oct. 7 L.	-0.2	IV

Mean..... -0.38
Corr. +0.49

22 H. Camelopardalis s. p.
6^h 7^m 50^s +69° 21' 17".74

1905 June 25 L.	+0.3	III
26 L.	+2.2	III
1906 Sept. 14 L.	+1.5	IV
18 L.	+0.1	IV

Mean..... +1.02
Corr. -0.84

Groombridge 1004
6^h 8^m 3^s +86° 45' "

1903 Feb. 9 E.	34.36	II
12 E.	34.46	II
1904 Feb. 15 L.	34.76	III
1906 Mar. 10 L.	34.06	IV
1907 Mar. 4 L.	33.99	IV

Mean..... +86 45 34.33
Corr. +0.68

Groombridge 1004 s. p.
6^h 8^m 3^s +86° 45' "

1903 Aug. 20 H.	36.23	II
1905 June 25 L.	35.83	III
26 L.	36.90	III

Mean..... +86 45 36.32
Corr. -0.73

7 Geminorum
6^h 8^m 51^s +22° 32' 9".02

1899 Mar. 1 H.	+0.6	I
1905 Feb. 24 L.	+0.4	III
26 L.	-0.5	III
1907 Feb. 22 L.	+0.1	IV
Mar. 2 L.	+0.6	IV

Mean..... +0.24
Corr. -0.13

2 Lyncis
6^h 10^m 48^s +59° 2' 50".39

1907 Feb. 15 L.	-0.9	IV
18 L.	-0.9	IV

Mean..... -0.90
Corr. +0.36

k Orionis
6^h 10^m 50^s +12° 18' 1".40

1903 Jan. 22 E.	+0.9	II
30 E.	+0.3	II
1904 Jan. 25 L.	0.0	III
30 L.	-0.4	III
1906 Feb. 26 L.	-0.2	IV
Mar. 2 L.	+0.1	IV

Mean..... +0.12
Corr. -0.26

7 Monocerotis
6^h 14^m 54^s -7° 46' 50".59

1903 Feb. 5 E.	-1.1	II
6 E.	-0.7	II
1904 Mar. 4 L.	+0.1	III
9 L.	+0.2	III
1906 Feb. 16 L.	+0.1	IV
20 L.	-0.3	IV

Mean..... -0.28
Corr. -0.48

5 Canis Majoris
6^h 16^m 28^s -30° 1' 8".78

1903 Mar. 3 E.	+0.7	II
4 E.	+1.7	II
1905 Mar. 13 L.	+2.2	III
15 L.	+2.6	III
1906 Mar. 21 L.	+1.5	IV
22 L.	+2.0	IV

Mean..... +1.78
Corr. -0.65

μ Geminorum
6^h 16^m 55^s +22° 33' 53".63

1899 Mar. 10 H.	-0.4	I
1904 Mar. 2 L.	0.0	III
10 L.	-0.1	III
1907 Mar. 11 L.	+0.9	IV
15 L.	+0.5	IV

Mean..... +0.18
Corr. -0.13

ϕ^1 Aurigæ
6^h 17^m 12^s +49° 20' 20".59

1899 Mar. 11 H.	+0.6	I
1904 Feb. 6 L.	0.0	III
1906 Feb. 24 L.	-1.0	IV
Mar. 5 L.	-0.7	IV

Mean..... -0.28
Corr. +0.23

β Canis Majoris
6^h 18^m 18^s -17° 54' 21".99

1905 Mar. 16 L.	+1.1	III
18 L.	+1.2	III
1907 Mar. 5 L.	+1.6	IV
6 L.	+0.5	IV

Mean..... +1.10
Corr. -0.57

8 Monocerotis
6^h 18^m 28^s +4° 38' 37".54

1904 Feb. 27 L.	+0.5	III
Mar. 1 L.	+1.6	III
1907 Mar. 2 L.	+0.6	IV
4 L.	+0.6	IV

Mean..... +0.82
Corr. -0.35

6 Lyncis 6 ^h 22 ^m 6 ^s +58° 14' 9".01			23 H. Camelopardalis s. p. 6 ^h 29 ^m 10 ^s +79° 40' 18".47			ξ Geminorum 6 ^h 39 ^m 41 ^s +13° 0' 11".62			24 H. Camelopardalis 6 ^h 45 ^m 29 ^s +77° 6' 17".42		
1903 Feb. 4 E.	-1.3	II	1904 Sept. 30 L.	+1.7	III	1904 Feb. 6 L.	+0.2	III	1904 Feb. 24 L.	-0.3	III
9 E.	-1.5	II	Oct. 3 L.	+0.4	III	Mar. 24 L.	0.0	III	27 L.	0.0	III
1904 Feb. 15 L.	-1.0	III	1906 Sept. 14 L.	+2.0	IV	1907 Feb. 27 L.	-0.5	IV	Oct. 4 L.	+0.6	III
1907 Feb. 18 L.	-1.2	IV	18 L.	+1.6	IV	Mar. 2 L.	+0.2	IV	7 L.	0.0	III
22 L.	-2.0	IV									
Mean.....	-1.40		Mean.....	+1.42		Mean.....	-0.02		Mean.....	+0.08	
Corr.	+0.35		Corr.	-0.78		Corr.	-0.25		Corr.	+0.58	
10 Monocerotis 6 ^h 23 ^m 1 ^s -4° 42' 0".80			ξ ² Canis Majoris 6 ^h 30 ^m 52 ^s -22° 53' 5".96			α Canis Majoris 6 ^h 40 ^m 44 ^s -16° 34' 47".05			24 H. Camelopardalis s. p. 6 ^h 45 ^m 29 ^s +77° 6' 17".41		
1906 Mar. 2 L.	+0.1	IV	1905 Feb. 28 L.	-1.7	III	1898 Sept. 26 H.	+0.4	I	1904 Oct. 3 L.	+1.1	III
6 L.	-0.3	IV	Mar. 2 L.	-0.5	III	28 H.	+0.3	I	4 L.	+1.5	III
Mean.....	-0.10		1907 Mar. 2 L.	-1.0	IV	29 H.	+0.2	I	Mean.....	+1.30	
Corr.	-0.45		4 L.	-0.2	IV	Oct. 16 H.	-0.3	I	Corr.	-0.80	
ν Geminorum 6 ^h 23 ^m 2 ^s +20° 16' 31".90			Mean.....	-0.85		1905 Mar. 6 L.	+1.6	III	κ Canis Majoris 6 ^h 46 ^m 6 ^s -32° 23' "		
1898 Oct. 16 H.	+0.7	I	Corr.	-0.61		23 L.	+2.1	III	1903 Feb. 9 E.	31.15	II
1899 Mar. 1 H.	+2.3	I				1907 Mar. 15 L.	+2.5	IV	12 E.	33.29	II
1904 Jan. 25 L.	+0.5	III				16 L.	+1.7	IV	Mar. 3 E.	32.72	II
30 L.	+0.8	III							1905 Feb. 28 L.	34.41	III
1906 Feb. 26 L.	-0.1	IV							Mar. 2 L.	32.80	III
Mar. 10 L.	0.0	IV							1906 Mar. 10 L.	32.79	IV
Mean.....	+0.70								17 L.	33.05	IV
Corr.	-0.16								Mean.....	-32 23 32.80	
λ Canis Majoris 6 ^h 24 ^m 28 ^s -32° 30' "			Mean.....	+0.15		Mean.....	+1.06		Corr.	-0.66	
1903 Feb. 6 E.	60.40	II	Corr.	+0.10		Corr.	-0.56		θ Geminorum 6 ^h 46 ^m 12 ^s +34° 4' 54".68		
1905 Feb. 24 L.	60.91	III							1899 Mar. 1 H.	-1.0	I
26 L.	60.40	III							1905 Feb. 24 L.	+0.4	III
1907 Feb. 25 L.	58.90	IV							Mar. 13 L.	+0.4	III
27 L.	59.17	IV							1907 Mar. 11 L.	-0.1	IV
Mean.....	-32 30 59.96								18 L.	+0.1	IV
Corr.	-0.66								Mean.....	-0.04	
13 Monocerotis 6 ^h 27 ^m 30 ^s +7° 24' 22".50			Mean.....	+0.94		Mean.....	+0.20		Corr.	+0.02	
1903 Jan. 23 E.	-1.6	II	Corr.	-0.21		Corr.	-0.38		15 Lyncis 6 ^h 48 ^m 37 ^s +58° 33' 13".51		
Feb. 5 E.	-0.1	II							1904 Jan. 30 L.	-0.3	III
Mar. 4 E.	+0.5	II							Feb. 2 L.	-0.2	III
1904 Mar. 9 L.	-0.2	III							1906 Mar. 21 L.	-0.6	IV
10 L.	+0.3	III							22 L.	-0.8	IV
1906 Feb. 16 L.	+0.1	IV							Mean.....	-0.48	
25 L.	-0.2	IV							Corr.	+0.36	
Mean.....	-0.17								e Geminorum 6 ^h 49 ^m 0 ^s +13° 18' 17".34		
Corr.	-0.32								1903 Mar. 12 E.	+1.0	II
8 Lyncis 6 ^h 28 ^m 33 ^s +61° 34' 7".47									1904 Feb. 6 L.	+0.1	III
1904 Feb. 6 L.	-0.4	III							20 L.	+0.8	III
Mar. 4 L.	-0.9	III							1907 Mar. 4 L.	+0.1	IV
1907 Mar. 6 L.	-0.7	IV							6 L.	-0.2	IV
11 L.	-0.6	IV							Mean.....	+0.25	
Mean.....	-0.65								Corr.	-0.25	
Corr.	+0.39								θ Canis Majoris 6 ^h 49 ^m 33 ^s -11° 54' 47".49		
23 H. Camelopardalis 6 ^h 29 ^m 10 ^s +79° 40' 18".79									1904 Feb. 15 L.	+1.1	III
1904 Feb. 27 L.	-0.2	III							20 L.	+0.8	III
Mar. 1 L.	-0.3	III							1907 Mar. 15 L.	+1.0	IV
Oct. 2 L.	-0.2	III							16 L.	+0.5	IV
7 L.	-1.1	III							Mean.....	+0.85	
1906 Oct. 7 L.	-0.1	IV							Corr.	-0.52	
9 L.	-0.9	IV							φ ⁵ Aurigæ 6 ^h 39 ^m 32 ^s +43° 40' 38".27		
Mean.....	-0.47								1905 Feb. 24 L.	+0.5	III
Corr.	+0.61								26 L.	-0.5	III
ξ ² Canis Majoris 6 ^h 30 ^m 52 ^s -22° 53' 5".96									1906 Feb. 16 L.	+0.4	IV
1905 Feb. 28 L.	-1.7	III							Mar. 2 L.	+0.3	IV
Mar. 2 L.	-0.5	III							Mean.....	+0.18	
1907 Mar. 2 L.	-1.0	IV							Corr.	+0.16	
4 L.	-0.2	IV							φ ⁷ Aurigæ 6 ^h 43 ^m 42 ^s +41° 53' 56".29		
Mean.....	-0.85								1905 Mar. 10 L.	-1.0	III
Corr.	-0.61								12 L.	-0.6	III
ν Geminorum 6 ^h 23 ^m 2 ^s +20° 16' 31".90									1906 Feb. 19 L.	-1.3	IV
1898 Oct. 16 H.	+0.7	I							Mar. 5 L.	-0.6	IV
1899 Mar. 1 H.	+2.3	I							Mean.....	-0.88	
1904 Jan. 25 L.	+0.5	III							Corr.	+0.13	
30 L.	+0.8	III							e Geminorum 6 ^h 49 ^m 0 ^s +13° 18' 17".34		
1906 Feb. 26 L.	-0.1	IV							1903 Mar. 12 E.	+1.0	II
Mar. 10 L.	0.0	IV							1904 Feb. 6 L.	+0.1	III
Mean.....	+0.70								20 L.	+0.8	III
Corr.	-0.16								1907 Mar. 4 L.	+0.1	IV
λ Canis Majoris 6 ^h 24 ^m 28 ^s -32° 30' "									6 L.	-0.2	IV
1903 Feb. 6 E.	60.40	II							Mean.....	+0.25	
1905 Feb. 24 L.	60.91	III							Corr.	-0.25	
26 L.	60.40	III							θ Canis Majoris 6 ^h 49 ^m 33 ^s -11° 54' 47".49		
1907 Feb. 25 L.	58.90	IV							1904 Feb. 15 L.	+1.1	III
27 L.	59.17	IV							20 L.	+0.8	III
Mean.....	-32 30 59.96								1907 Mar. 15 L.	+1.0	IV
Corr.	-0.66								16 L.	+0.5	IV
13 Monocerotis 6 ^h 27 ^m 30 ^s +7° 24' 22".50									Mean.....	+0.85	
1903 Jan. 23 E.	-1.6	II							Corr.	-0.52	
Feb. 5 E.	-0.1	II							φ ⁵ Aurigæ 6 ^h 39 ^m 32 ^s +43° 40' 38".27		
Mar. 4 E.	+0.5	II							1905 Feb. 24 L.	+0.5	III
1904 Mar. 9 L.	-0.2	III							26 L.	-0.5	III
10 L.	+0.3	III							1906 Feb. 16 L.	+0.4	IV
1906 Feb. 16 L.	+0.1	IV							Mar. 2 L.	+0.3	IV
25 L.	-0.2	IV							Mean.....	+0.18	
Mean.....	-0.17								Corr.	+0.16	
Corr.	-0.32								φ ⁷ Aurigæ 6 ^h 43 ^m 42 ^s +41° 53' 56".29		
8 Lyncis 6 ^h 28 ^m 33 ^s +61° 34' 7".47									1905 Mar. 10 L.	-1.0	III
1904 Feb. 6 L.	-0.4	III							12 L.	-0.6	III
Mar. 4 L.	-0.9	III							1906 Feb. 19 L.	-1.3	IV
1907 Mar. 6 L.	-0.7	IV							Mar. 5 L.	-0.6	IV
11 L.	-0.6	IV							Mean.....	-0.88	
Mean.....	-0.65								Corr.	+0.13	
Corr.	+0.39								e Geminorum 6 ^h 49 ^m 0 ^s +13° 18' 17".34		
23 H. Camelopardalis 6 ^h 29 ^m 10 ^s +79° 40' 18".79									1903 Mar. 12 E.	+1.0	II
1904 Feb. 27 L.	-0.2	III							1904 Feb. 6 L.	+0.1	III
Mar. 1 L.	-0.3	III							20 L.	+0.8	III
Oct. 2 L.	-0.2	III							1907 Mar. 4 L.	+0.1	IV
7 L.	-1.1	III							6 L.	-0.2	IV
1906 Oct. 7 L.	-0.1	IV							Mean.....	+0.25	
9 L.	-0.9	IV							Corr.	-0.25	
Mean.....	-0.47								θ Canis Majoris 6 ^h 49 ^m 33 ^s -11° 54' 47".49		
Corr.	+0.61								1904 Feb. 15 L.	+1.1	III
ξ ² Canis Majoris 6 ^h 30 ^m 52 ^s -22° 53' 5".96									20 L.	+0.8	III
1905 Feb. 28 L.	-1.7	III							1907 Mar. 15 L.	+1.0	IV
Mar. 2 L.	-0.5	III							16 L.	+0.5	IV
1907 Mar. 2 L.	-1.0	IV							Mean.....	+0.85	
4 L.	-0.2	IV							Corr.	-0.52	
Mean.....	-0.85								φ ⁵ Aurigæ 6 ^h 39 ^m 32 ^s +43° 40' 38".27		
Corr.	-0.61								1905 Feb. 24 L.	+0.5	III
ν Geminorum 6 ^h 23 ^m 2 ^s +20° 16' 31".90									26 L.	-0.5	III
1898 Oct. 16 H.	+0.7	I							1906 Feb. 16 L.	+0.4	IV
1899 Mar. 1 H.	+2.3	I							Mar. 2 L.	+0.3	IV
1904 Jan. 25 L.	+0.5	III							Mean.....	+0.18	
30 L.	+0.8	III							Corr		

[illegible]

ϕ Geminorum
7^h 47^m 23^s +27° 1' 29".08

1899 Mar. 17 H.	-1.4	I
Apr. 5 H.	-0.6	I
1905 Mar. 6 L.	-0.6	III
13 L.	-0.4	III
1907 Mar. 29 L.	+0.6	IV
Apr. 1 L.	-0.1	IV
Mean.....	-0.42	
Corr.	-0.07	

26 Lyncis
7^h 47^m 26^s +47° 49' 26".23

1899 Mar. 31 H.	-0.1	I
1905 Mar. 16 L.	0.0	III
23 L.	0.0	III
1907 Mar. 2 L.	+0.6	IV
15 L.	+0.1	IV
Mean.....	+0.12	
Corr.	+0.21	

166 B. Camelopardalis
7^h 48^m 14^s +74° 11' 6".38

1899 Apr. 3 H.	+1.1	I
1904 Mar. 22 L.	-0.7	III
Oct. 18 L.	+0.1	III
22 L.	-0.2	III
Mean.....	+0.08	
Corr.	+0.55	

166 B. Camelopardalis s. p.
7^h 48^m 14^s +74° 11' 6".33

1904 May 24 L.	+0.7	III
June 10 L.	+0.4	III
Oct. 19 L.	+1.0	III
22 L.	+1.1	III
Mean.....	+0.80	
Corr.	-0.82	

1 Cancri
7^h 51^m 19^s +16° 3' 26".67

1903 Mar. 19 E.	+0.3	II
26 E.	-0.4	II
1905 Mar. 10 L.	-0.4	III
12 L.	-0.2	III
1907 Mar. 16 L.	0.0	IV
18 L.	-1.0	IV
Mean.....	-0.28	
Corr.	-0.22	

53 Camelopardalis
7^h 53^m 10^s +60° 35' 52".44

1904 Feb. 24 L.	-0.8	III
Mar. 25 L.	-0.6	III
1907 Mar. 22 L.	-0.1	IV
28 L.	+0.2	IV
Mean.....	-0.32	
Corr.	+0.38	

ω^1 Cancri
7^h 54^m 13^s +25° 39' 59".92

1899 Mar. 24 H.	-1.6	I
1904 Feb. 20 L.	0.0	III
22 L.	+0.1	III
1906 Mar. 10 L.	-0.4	IV
21 L.	+0.1	IV
Mean.....	0.36	
Corr.	0.09	

3 Cancri
7^h 55^m 4^s +17° 34' "

1903 Mar. 17 E.	57.93	II
31 E.	58.75	II
1905 Mar. 25 L.	58.24	III
27 L.	57.76	III
28 L.	57.81	III
29 L.	57.45	III
1906 Mar. 23 L.	59.16	IV
Apr. 3 L.	58.73	IV

Mean..... +17 34 58.23
Corr. -0.20

χ Geminorum
7^h 57^m 23^s +28° 4' 28".91

1904 Mar. 1 L.	+0.3	III
4 L.	-0.2	III
1906 Apr. 6 L.	-0.2	IV
7 L.	-0.3	IV

Mean..... -0.10
Corr. -0.06

4 B. Ursæ Minoris
7^h 58^m 3^s +88° 55' 59".43

1903 Mar. 3 E.	-0.4	II
4 E.	-1.7	II
25 E.	-0.9	II
Apr. 4 E.	-1.5	II
1904 Mar. 9 L.	-1.9	III
16 L.	-1.2	III
Oct. 23 L.	-1.1	III
24 L.	-1.1	III
30 L.	-1.8	III

Mean..... -1.29
Corr. +0.70

4 B. Ursæ Minoris s. p.
7^h 58^m 3^s +88° 55' 59".43

1903 Sept. 15 H.	+0.7	II
19 H.	+1.6	II
Oct. 19 H.	+0.8	II
1904 May 24 L.	+1.3	III
Oct. 19 L.	+0.7	III
21 L.	+1.1	III
29 L.	+0.4	III

Mean..... +0.94
Corr. -0.71

27 Lyncis
8^h 0^m 56^s +51° 47' 42".25

1904 Mar. 22 L.	0.0	III
1907 Mar. 16 L.	-0.8	IV
18 L.	-0.2	IV

Mean..... -0.33
Corr. +0.27

μ Cancri
8^h 1^m 53^s +21° 52' 18".79

1903 Mar. 12 E.	+0.2	II
14 E.	+0.6	II
19 E.	0.0	II
1905 Mar. 10 L.	+0.7	III
12 L.	+1.3	III
1906 Apr. 12 L.	+0.8	IV
13 L.	+1.0	IV

Mean..... 1.066
Corr. 0.14

3 H. Ursæ Majoris
8^h 2^m 52^s +68° 46' 6".96

1899 Mar. 17 H.	-0.1	I
31 H.	+0.5	I
1904 Apr. 9 L.	0.0	III
11 L.	-0.7	III
Oct. 18 L.	-1.0	III
22 L.	-1.3	III
1906 Nov. 1 L.	-0.7	IV
2 L.	-0.7	IV

Mean..... -0.50
Corr. +0.48

3 H. Ursæ Majoris s. p.
8^h 2^m 52^s +68° 46' 6".97

1904 June 10 L.	+0.4	III
Oct. 18 L.	+0.3	III
24 L.	+1.1	III
1906 Oct. 29 L.	+2.6	IV
30 L.	+1.0	IV

Mean..... +1.08
Corr. -0.84

ρ Argûs
8^h 3^m 17^s -24° 0' 56".74

1899 Apr. 13 H.	+0.4	I
1905 Mar. 16 L.	+0.3	III
27 L.	+0.1	III
1907 Mar. 15 L.	+0.4	IV
20 L.	+0.4	IV
29 L.	+1.3	IV

Mean..... +0.48
Corr. -0.61

ϕ Cancri
8^h 4^m 26^s +25° 48' "

1903 Mar. 17 E.	39.10	II
18 E.	38.68	II
26 E.	38.97	II
31 E.	38.52	II
Apr. 1 E.	38.96	II
1904 Mar. 29 L.	38.41	III
1906 Apr. 2 L.	37.50	IV
3 L.	38.21	IV

Mean..... +25 48 38.54
Corr. -0.09

Groombridge 1391
8^h 5^m 13^s +82° 44' "

1903 Nov. 7 H.	25.44	II
8 H.	25.77	II

Mean..... +82 44 25.60
Corr. +0.64

Groombridge 1391 s. p.
8^h 5^m 13^s +82° 44' "

1903 Nov. 7 H.	27.61	II
8 H.	27.93	II

Mean..... +82 44 27.77
Corr. -0.76

ζ Cancri (Mean of close double)
8^h 6^m 29^s +17° 56' 57".64

1899 Apr. 5 H.	0.0	I
1904 Feb. 24 L.	-1.6	III
Mar. 25 L.	-1.5	III
1907 Mar. 22 L.	-1.5	IV
28 L.	-0.5	IV

Mean..... 1.02
Corr. -0.19

173 B. Camelopardalis
8^h 6^m 59^s +76° 3' 43".92

1904 Feb. 20 L.	-1.3	III
22 L.	0.0	III
Oct. 27 L.	-0.6	III
28 L.	-0.1	III
1906 Nov. 4 L.	+0.2	IV
5 L.	+1.2	IV

Mean..... -0.10
Corr. +0.57

173 B. Camelopardalis s. p.
8^h 6^m 59^s +76° 3' 43".92

1904 Oct. 27 L.	+1.2	III
28 L.	+1.6	III
1906 Nov. 1 L.	+0.6	IV
2 L.	+1.8	IV

Mean..... +1.30
Corr. -0.81

20 Puppis
8^h 8^m 44^s -15° 29' 12".59

1904 Mar. 4 L.	+1.2	III
Apr. 5 L.	+0.6	III
1906 Mar. 21 L.	+0.5	IV
23 L.	+0.7	IV

Mean..... +0.75
Corr. -0.55

β Cancri
8^h 11^m 6^s +9° 29' 37".67

1899 Mar. 17 H.	+0.1	I
Apr. 12 H.	-0.2	I
1905 Mar. 28 L.	+0.8	III
29 L.	+0.9	III
1907 Apr. 1 L.	+0.2	IV
3 L.	+0.4	IV

Mean..... +0.37
Corr. -0.30

58 Camelopardalis
8^h 12^m 22^s +58° 3' "

1903 Mar. 3 E.	16.33	II
4 E.	16.98	II
19 E.	16.32	II
31 E.	17.27	II
Apr. 4 E.	16.19	II
1905 Mar. 16 L.	17.22	III
25 L.	17.20	III
1906 Apr. 6 L.	17.07	IV
12 L.	17.19	IV

Mean..... +58 3 16.86
Corr. +0.35

χ Cancri
8^h 13^m 59^s +27° 32' 28".11

1903 Mar. 12 E.	-1.3	II
13 E.	-0.5	II
18 E.	-0.4	II
25 E.	-0.2	II
1904 Mar. 22 L.	+0.3	III
1907 Mar. 16 L.	+0.6	IV
18 L.	-0.2	IV

Mean..... 0.24
Corr. -0.07

31 Lynceis
8^h 16^m 0^s +43° 30' 32".10

1904 Mar. 29 L.	-0.6	III
Apr. 2 L.	-0.2	III
1907 Mar. 20 L.	+0.5	IV
29 L.	-0.3	IV

Mean..... -0.15
Corr. +0.15

d¹ Cancri
8^h 17^m 38^s +18° 39' 11".88

1903 Mar. 14 E.	+1.2	II
17 E.	+1.1	II
26 E.	+1.6	II
Apr. 6 E.	+1.6	II
1904 Mar. 9 L.	+0.6	III
16 L.	+0.7	III
1906 Apr. 2 L.	+0.7	IV
3 L.	+1.2	IV

Mean..... +1.09
Corr. -0.18

30 Monocerotis
8^h 20^m 40^s -3° 34' 48".36

1899 Apr. 3 H.	-0.4	I
5 H.	-1.5	I
13 H.	-0.3	I
1904 Mar. 4 L.	-0.3	III
25 L.	-1.1	III
1907 Mar. 22 L.	+0.3	IV
28 L.	+0.7	IV

Mean..... -0.37
Corr. -0.44

o Ursæ Majoris
8^h 21^m 58^s +61° 3' 8".74

1904 Apr. 5 L.	-0.7	III
9 L.	-0.2	III
1907 Apr. 1 L.	-1.0	IV
3 L.	-1.3	IV

Mean..... -0.80
Corr. +0.39

29 Cancri
8^h 23^m 3^s +14° 32' 30".69

1903 Mar. 3 E.	+0.3	II
4 E.	-0.8	II
Apr. 1 E.	+0.1	II
4 E.	-0.3	II
1905 Mar. 16 L.	+0.2	III
25 L.	+0.2	III
1906 Mar. 21 L.	+0.7	IV
23 L.	+1.2	IV

Mean..... +0.20
Corr. -0.24

Groombridge 1418
8^h 25^m 21^s +85° 24' "

1903 Mar. 12 E.	26.49	II
13 E.	27.10	II
25 E.	27.99	II
1904 Oct. 28 L.	27.91	III
30 L.	27.75	III
1906 Nov. 1 L.	28.08	IV
2 L.	27.54	IV

Mean..... +85 24 27.55
Corr. +0.66

Groombridge 1418 S. P.
8^h 25^m 21^s +85° 24' "

1903 Sept. 24 H.	29.75	II
26 H.	29.52	II
30 H.	29.47	II
Oct. 7 H.	29.89	II
18 H.	30.00	II
19 H.	30.15	II
1904 Oct. 28 L.	29.47	III
29 L.	29.29	III
1906 Oct. 29 L.	29.64	IV
30 L.	29.59	IV

Mean..... +85 24 29.68
Corr. -0.74

θ Cancri
8^h 25^m 54^s +18° 25' 56".20

1903 Mar. 18 E.	+1.6	II
19 E.	+1.0	II
31 E.	+0.4	II
1905 Mar. 27 L.	+0.8	III
28 L.	+0.8	III
1906 Apr. 6 L.	+0.6	IV
12 L.	+0.9	IV

Mean..... +0.87
Corr. -0.19

110 B. Lynceis
8^h 26^m 25^s +38° 21' 32".98

1905 Mar. 29 L.	-0.3	III
31 L.	-0.5	III
1907 Mar. 16 L.	-0.9	IV
18 L.	-0.5	IV

Mean..... -0.55
Corr. +0.08

η Cancri
8^h 26^m 56^s +20° 46' 51".29

1899 Mar. 31 H.	-0.8	I
Apr. 12 H.	-0.4	I
1904 Apr. 3 L.	+0.2	III
1906 Apr. 13 L.	+0.8	IV
16 L.	+0.1	IV

Mean..... -0.02
Corr. -0.16

181 B. Camelopardalis
8^h 28^m 36^s +73° 58' 44".89

1904 Mar. 9 L.	-0.4	III
16 L.	+0.4	III
Oct. 23 L.	+0.1	III
24 L.	+1.0	III
27 L.	0.0	III

Mean..... +0.22
Corr. +0.54

181 B. Camelopardalis S. P.
8^h 28^m 36^s +73° 58' 44".86

1904 Oct. 24 L.	+1.0	III
27 L.	+1.6	III

Mean..... +1.30
Corr. -0.82

27 B. Ursæ Majoris
8^h 31^m 53^s +53° 3' 44".03

1904 Mar. 4 L.	-1.2	III
29 L.	-1.2	III
1906 Apr. 2 L.	-1.4	IV
3 L.	-0.3	IV

Mean..... -1.02
Corr. +0.28

δ Hydræ
8^h 32^m 22^s +6° 3' 9".24

1903 Apr. 1 E.	+0.2	II
1904 Mar. 22 L.	+0.5	III
25 L.	-1.6	III
1907 Apr. 1 L.	-0.9	IV
3 L.	-0.5	IV

Mean..... -0.46
Corr. -0.34

σ Hydræ
8^h 33^m 32^s +3° 41' 33".50

1899 Mar. 17 H.	-0.3	I
24 H.	0.0	I
Apr. 3 H.	+0.2	I
5 H.	+0.6	I
1905 Apr. 3 L.	0.0	III
9 L.	+0.1	III
1907 Mar. 28 L.	-0.2	IV
29 L.	+0.1	IV

Mean..... +0.06
Corr. -0.37

19 G. Pyxidis
8^h 34^m 45^s -22° 19' "

1903 Apr. 4 E.	16.91	II
1905 Mar. 16 L.	15.03	III
25 L.	15.86	III
1907 Mar. 16 L.	14.11	IV
18 L.	13.91	IV

Mean..... -22 19 15.16
Corr. -0.60

6 Hydræ
8^h 35^m 17^s -12° 7' 18".67

1903 Mar. 19 E.	+0.5	II
1904 Apr. 9 L.	+0.1	III
11 L.	+1.0	III
1906 Mar. 21 L.	+0.4	IV
23 L.	+0.4	IV

Mean..... +0.48
Corr. -0.52

β Pyxidis
8^h 36^m 11^s -34° 57' "

1903 Mar. 12 E.	9.88	II
13 E.	10.86	II
1904 Apr. 4 L.	11.60	III
5 L.	11.79	III
1907 Mar. 20 L.	13.22	IV
22 L.	10.66	IV

Mean..... -34 57 11.34
Corr. -0.67

7 Cancri
8^h 37^m 30^s +21° 49' 41".41

1905 Mar. 27 L.	+0.6	III
28 L.	+0.8	III
1906 Apr. 6 L.	+0.8	IV
12 L.	+0.6	IV

Mean..... +0.70
Corr. -0.14

δ Cancri
8^h 39^m 0^s +18° 31' 17".63

1905 Mar. 29 L.	-0.2	III
31 L.	+0.5	III
1906 Apr. 18 L.	+0.1	IV
19 L.	+0.5	IV

Mean..... +0.22
Corr. -0.19

α Mali
8^h 39^m 34^s -32° 49' 32".86

1903 Mar. 18 E.	+1.2	II
25 E.	+0.1	II
31 E.	+0.5	II
1904 Mar. 23 L.	+0.7	III
Apr. 2 L.	-0.3	III
Nov. 1 L.	+0.1	III
6 L.	-0.7	III
1906 Apr. 13 L.	+1.0	IV
16 L.	+1.1	IV

Mean..... +0.41
Corr. -0.66

ε Cancri
8^h 40^m 39^s +29° 7' 32".54

1904 Mar. 9 L.	0.0	III
16 L.	+0.7	III
1907 Apr. 11 L.	+0.4	IV
12 L.	+0.8	IV

Mean..... +0.48
Corr. -0.04

ε Hydræ
8^h 41^m 29^s +6° 47' 8".78

1899 Apr. 5 H.	0.0	I
1905 Apr. 3 L.	+0.6	III
9 L.	+0.3	III
1907 Apr. 3 L.	-0.1	IV
9 L.	-0.1	IV

Mean..... +0.14
Corr. -0.33

14 Hydræ
8^h 44^m 20^s -3° 4' 18".72

1903 Mar. 17 E.	+0.8	II
26 E.	0.0	II
1904 Mar. 25 L.	-0.9	III
29 L.	+0.7	III
1906 Apr. 2 L.	+0.5	IV
3 L.	+0.5	IV

Mean..... +0.27
Corr. -0.44

B. D. +83° 233' "

8^h 44^m 31^s +83° 7' "

1903 Nov. 10 H. +83 7 37.56 II
Corr. +0.64

B. D. +83° 233 S. P.
8^h 44^m 31^s +83° 7' "

1903 Nov. 9 H. 38.46 II
10 H. 36.55 II

Mean..... +83 7 37.50
Corr. -0.76

7 Pyxidis
8^h 46^m 17^s -27° 20' "

1903 Mar. 19 E. 18.86 II
Apr. 4 E. 19.60 II
1905 Mar. 25 L. 18.24 III
27 L. 18.55 III
1907 Mar. 20 L. 19.33 IV
22 L. 19.47 IV

Mean..... -27 20 19.01
Corr. -0.63

8^h 46^m 39^s +28° 42' 45".47

1903 Mar. 14 E. -1.3 II
1904 Apr. 11 L. +0.2 III
14 L. -0.6 III
1906 Mar. 21 L. -0.5 IV
23 L. -0.1 IV

Mean..... -0.46
Corr. -0.05

8^h 48^m 9^s +30° 57' 29".50

1904 Apr. 4 L. +0.9 III
5 L. +0.8 III
1907 Mar. 28 L. -0.3 IV
29 L. -0.8 IV
Apr. 1 L. -0.2 IV

Mean..... +0.08
Corr. -0.02

8^h 50^m 7^s +6° 19' 34".57

1904 Mar. 22 L. -0.1 III
Apr. 20 L. +1.0 III
1906 Apr. 13 L. +0.2 IV
16 L. +0.2 IV

Mean..... +0.32
Corr. -0.34

8^h 50^m 28^s +12° 0' 29".15

1903 Apr. 18 E. +0.2 II
1904 Apr. 1 L. +0.6 III
2 L. +0.7 III
1906 Apr. 6 L. +0.5 IV
12 L. +0.7 IV

Mean..... +0.54
Corr. -0.27

8^h 52^m 22^s +48° 26' 3".22

1899 Mar. 17 H. -1.1 I
31 H. +0.6 I
Apr. 3 H. +0.3 I
5 H. +0.3 I
1905 Apr. 13 L. -0.7 III
18 L. -0.1 III
1907 Apr. 12 L. -0.8 IV
15 L. -0.4 IV

Mean..... +0.04
Corr. -0.22

8^h 53^m 1^s +12° 14' 41".42

1905 Mar. 28 L. +0.2 III
29 L. -0.2 III
1906 Apr. 18 L. +0.5 IV
19 L. +0.6 IV

Mean..... +0.28
Corr. -0.27

8^h 53^m 32^s +68° 1' 9".97

1904 Mar. 9 L. -0.3 III
16 L. 0.0 III
Oct. 28 L. +0.2 III
30 L. +0.1 III
1906 Nov. 1 L. +0.5 IV
2 L. 0.0 IV

Mean..... +0.08
Corr. +0.47

8^h 53^m 32^s +68° 1' 9".98

1904 Oct. 29 L. -0.7 III
31 L. -1.5 III
1906 Oct. 29 L. +0.8 IV
30 L. +0.3 IV

Mean..... -0.28
Corr. -0.85

8^h 54^m 9^s +42° 10' 42".29

1905 Mar. 31 L. +0.3 III
Apr. 3 L. 0.0 III
1907 Apr. 9 L. +0.1 IV
11 L. +0.5 IV
17 L. +0.1 IV

Mean..... +0.20
Corr. +0.13

8^h 56^m 18^s +81° 13' "

1903 Nov. 7 H. 45.55 II
8 H. 44.57 II
10 H. 45.96 II

Mean..... +81 13 45.36
Corr. +0.62

8^h 56^m 18^s +81° 13' "

1903 Nov. 7 H. 47.42 II
8 H. 47.71 II
9 H. 47.80 II
10 H. 46.91 II

Mean..... +81 13 47.34
Corr. -0.77

8^h 56^m 41^s +54° 40' 40".93

1904 Mar. 25 L. +0.8 III
29 L. +0.5 III
1906 Apr. 2 L. -0.5 IV
3 L. -0.4 IV

Mean..... +0.10
Corr. +0.31

8^h 56^m 48^s +47° 33' 7".23

1905 Apr. 9 L. +0.5 III
19 L. 0.0 III
1907 Apr. 1 L. -0.4 IV
3 L. -0.4 IV

Mean..... -0.08
Corr. +0.21

8^h 56^m 54^s +24° 50' 47".84

1903 Mar. 14 E. -0.5 II
17 E. -0.8 II
19 E. -0.2 II
26 E. 0.0 II
1905 Mar. 25 L. +0.1 III
27 L. -0.3 III
1907 Mar. 20 L. -0.9 IV
22 L. -0.8 IV

Mean..... -0.42
Corr. -0.10

9^h 0^m 10^s +38° 51' 6".69

1904 Apr. 14 L. +1.3 III
16 L. +0.5 III
1906 Apr. 13 L. +0.5 IV
16 L. +0.9 IV

Mean..... +0.80
Corr. +0.09

9^h 0^m 43^s +5° 29' 32".07

1903 Mar. 13 E. +0.2 II
Apr. 4 E. -0.6 II
1904 Apr. 18 L. 0.0 III
20 L. -0.2 III
1906 Apr. 6 L. -0.6 IV
12 L. -0.3 IV

Mean..... -0.25
Corr. -0.34

9^h 1^m 36^s +67° 32' 25".79

1899 Apr. 12 H. 0.0 I
1904 Nov. 1 L. -0.2 III
6 L. -0.5 III
1906 Nov. 1 L. -0.7 IV
2 L. -0.7 IV

Mean..... -0.42
Corr. +0.47

9^h 1^m 36^s +67° 32' 25".71

1904 Nov. 1 L. -0.3 III
2 L. +0.9 III
7 L. +1.4 III
1906 Nov. 2 L. +1.4 IV
4 L. +0.2 IV

Mean..... +0.72
Corr. -0.85

9^h 2^m 20^s +11° 4' 14".55

1899 Mar. 31 H. +0.6 I
Apr. 3 H. +0.5 I
5 H. +0.6 I
1905 Mar. 28 L. 0.0 II
Apr. 3 L. +0.5 III
1907 Mar. 28 L. -0.4 IV
29 L. -0.2 IV

Mean..... +0.23
Corr. -0.28

9^h 3^m 37^s +22° 27' 0".24

1903 Apr. 10 E. -0.6 II
1904 Apr. 4 L. +0.9 III
5 L. +0.4 III
1906 Apr. 18 L. 0.0 IV
19 L. +0.5 IV

Mean..... +0.24
Corr. -0.13

9^h 7^m 16^s +43° 37' 48".37

1904 Mar. 16 L. +0.7 III
22 L. -1.7 III
1907 Apr. 1 L. -0.1 IV
3 L. -0.2 IV

Mean..... -0.32
Corr. +0.16

9^h 9^m 10^s +2° 44' 9".58

1899 Apr. 12 H. -0.5 I
20 H. +0.2 I
1904 Mar. 29 L. -0.4 III
Apr. 1 L. -1.8 III
1907 Apr. 11 L. -0.7 IV
12 L. 0.0 IV

Mean..... -0.53
Corr. -0.38

9^h 12^m 37^s +37° 13' 32".21

1904 Apr. 11 L. -0.4 III
14 L. +0.3 III
1906 Apr. 13 L. -0.6 IV
16 L. +0.1 IV

Mean..... -0.15
Corr. +0.07

9^h 13^m 24^s +18° 7' 45".04

1904 Apr. 5 L. +0.4 III
9 L. +0.2 III
1906 Apr. 2 L. +0.4 IV
3 L. +0.6 IV

Mean..... +0.40
Corr. -0.19

40 Lynceis			
9 ^h 14 ^m 58 ^s	+34° 48' 55".91		
1899 Mar. 31 H.	+0.6 I		
Apr. 3 H.	-0.6 I		
9 H.	-0.3 I		
24 H.	-0.3 I		
1904 Apr. 4 L.	-0.4 III		
1907 Mar. 28 L.	+0.6 IV		
29 L.	+0.8 IV		
Mean.....	+0.06		
Corr.	+0.03		

h Mali			
9 ^h 17 ^m 4 ^s	-25° 32' 24".44		
1903 Mar. 12 E.	+3.3 II		
13 E.	+2.6 II		
31 E.	+2.8 II		
1904 Mar. 16 L.	+2.7 III		
25 L.	+0.9 III		
1905 Mar. 28 L.	+2.6 III		
Apr. 3 L.	+2.7 III		
1906 Apr. 6 L.	+2.2 IV		
12 L.	+2.1 IV		
1907 Apr. 15 L.	+2.5 IV		
17 L.	+2.1 IV		
Mean.....	+2.41		
Corr.	-0.62		

28 Hydræ			
9 ^h 20 ^m 24 ^s	-4° 41' 10".15		
1903 Mar. 25 E.	+1.2 II		
Apr. 1 E.	+1.0 II		
6 E.	+0.7 II		
1904 Mar. 29 L.	+0.8 III		
Apr. 1 L.	-1.0 III		
1905 Apr. 9 L.	+1.0 III		
1906 Apr. 24 L.	-0.2 IV		
28 L.	-0.3 IV		
Mean.....	+0.40		
Corr.	-0.45		

α Hydræ			
9 ^h 22 ^m 40 ^s	-8° 13' 29".82		
1904 Mar. 22 L.	-0.1 III		
Apr. 14 L.	+1.9 III		
1907 Apr. 1 L.	+1.4 IV		
3 L.	+1.7 IV		
Mean.....	+1.22		
Corr.	-0.49		

1 H. Draconis			
9 ^h 22 ^m 51 ^s	+81° 46' 6".78		
1903 Mar. 14 E.	-1.8 II		
Nov. 10 H.	-2.0 II		
1904 Apr. 20 L.	-0.2 III		
30 L.	-0.9 III		
Nov. 6 L.	-0.1 III		
28 L.	-0.3 III		
1906 Nov. 1 L.	+0.6 IV		
2 L.	-0.1 IV		
Mean.....	-0.60		
Corr.	+0.63		

1 H. Draconis s. P.			
9 ^h 22 ^m 51 ^s	+81° 46' 6".78		
1903 Nov. 4 H.	+0.6 II		
7 H.	+0.2 II		
9 H.	-0.1 II		
10 H.	+0.7 II		
1904 June 10 L.	+0.9 III		
20 L.	+0.9 III		
Nov. 7 L.	+0.6 III		
28 L.	+1.4 III		
1906 Nov. 2 L.	+0.7 IV		
4 L.	+1.6 IV		
Mean.....	+0.75		
Corr.	-0.77		

h Ursæ Majoris			
9 ^h 23 ^m 39 ^s	+63° 29' 57".21		
1904 Apr. 5 L.	-0.6 III		
9 L.	+0.2 III		
1907 Mar. 28 L.	+0.6 IV		
29 L.	+0.8 IV		
Mean.....	+0.25		
Corr.	+0.42		

d Ursæ Majoris			
9 ^h 25 ^m 39 ^s	+70° 16' 12".27		
1899 Apr. 9 H.	+1.0 I		
1904 Nov. 21 L.	-0.3 III		
23 L.	+0.3 III		
1906 Nov. 4 L.	-0.9 IV		
5 L.	-0.9 IV		
16 L.	0.0 IV		
Mean.....	-0.13		
Corr.	+0.50		

d Ursæ Majoris s. P.			
9 ^h 25 ^m 39 ^s	+70° 16' 12".34		
1904 Nov. 21 L.	+1.1 III		
23 L.	+1.6 III		
1906 Nov. 6 L.	+0.5 IV		
7 L.	+0.2 IV		
Mean.....	+0.85		
Corr.	-0.84		

θ Ursæ Majoris			
9 ^h 26 ^m 10 ^s	+52° 7' 56".58		
1904 Apr. 16 L.	+0.1 III		
18 L.	+0.1 III		
1907 Apr. 11 L.	+0.4 IV		
12 L.	-0.1 IV		
Mean.....	+0.12		
Corr.	+0.27		

ξ Leonis			
9 ^h 26 ^m 33 ^s	+11° 44' 33".53		
1903 Apr. 17 H.	-1.1 II		
1904 Apr. 4 L.	+0.2 III		
1906 Apr. 2 L.	-0.4 IV		
3 L.	+0.6 IV		
Mean.....	-0.18		
Corr.	-0.27		

10 Leonis Minoris			
9 ^h 28 ^m 6 ^s	+36° 50' 29".90		
1905 Apr. 16 L.	-0.2 III		
17 L.	-0.8 III		
1906 Apr. 13 L.	-0.1 IV		
16 L.	+0.1 IV		
Mean.....	-0.25		
Corr.	+0.06		

160 G. Hydræ			
9 ^h 28 ^m 36 ^s	-20° 40' "		
1903 Apr. 18 E.	22.93 II		
1905 Mar. 28 L.	22.52 III		
Apr. 3 L.	21.61 III		
1906 Apr. 6 L.	22.09 IV		
12 L.	22.98 IV		
Mean.....	-20 40 22.43		
Corr.	-0.59		

A Hydræ			
9 ^h 29 ^m 33 ^s	-5° 28' 6".18		
1903 Mar. 31 E.	-0.6 II		
Apr. 10 E.	-0.4 II		
1905 Apr. 7 L.	+0.4 III		
9 L.	-0.3 III		
1906 Apr. 18 L.	-0.3 IV		
19 L.	-0.5 IV		
Mean.....	-0.28		
Corr.	-0.46		

10 Leonis			
9 ^h 31 ^m 56 ^s	+7° 17' 3".10		
1903 Mar. 18 E.	+0.3 II		
25 E.	+0.6 II		
1904 Mar. 16 L.	+0.4 III		
25 L.	-0.2 III		
1907 Apr. 15 L.	+0.1 IV		
17 L.	-0.1 IV		
Mean.....	+0.18		
Corr.	-0.32		

2 Sextantis			
9 ^h 33 ^m 14 ^s	+5° 6' 3".64		
1903 Mar. 26 E.	-0.3 II		
1904 Apr. 20 L.	-1.0 III		
30 L.	-0.5 III		
1907 Mar. 28 L.	-0.9 IV		
29 L.	-0.5 IV		
Mean.....	-0.64		
Corr.	-0.35		

89 B. Ursæ Majoris			
9 ^h 33 ^m 42 ^s	+69° 41' 33".03		
1904 Nov. 21 L.	0.0 III		
23 L.	+0.6 III		
1906 Nov. 16 L.	+0.5 IV		
22 L.	0.0 IV		
Mean.....	+0.28		
Corr.	+0.49		

89 B. Ursæ Majoris s. P.			
9 ^h 33 ^m 42 ^s	+69° 41' 33".03		
1904 Nov. 21 L.	-0.1 III		
23 L.	+1.4 III		
1906 Nov. 16 L.	+2.0 IV		
21 L.	+1.6 IV		
Mean.....	+1.22		
Corr.	-0.84		

ι Hydræ			
9 ^h 34 ^m 45 ^s	-0° 41' 19".63		
1903 Apr. 1 E.	+1.8 II		
1904 Mar. 29 L.	+0.3 III		
Apr. 1 L.	+0.5 III		
1907 Apr. 1 L.	-0.4 IV		
3 L.	-0.3 IV		
Mean.....	+0.38		
Corr.	-0.41		

κ Hydræ			
9 ^h 35 ^m 31 ^s	-13° 52' 42".27		
1903 Apr. 6 E.	0.0 II		
1904 Apr. 9 L.	-0.2 III		
14 L.	+1.3 III		
1906 Apr. 24 L.	+0.2 IV		
28 L.	+0.2 IV		
Mean.....	+0.30		
Corr.	-0.54		

ο Leonis			
9 ^h 35 ^m 49 ^s	+10° 20' 50".67		
1899 Mar. 17 H.	-1.1 I		
Apr. 9 H.	+0.7 I		
12 H.	+0.8 I		
16 H.	-0.6 I		
1904 Apr. 4 L.	+0.2 III		
5 L.	+0.2 III		
1907 Apr. 24 L.	-0.7 IV		
27 L.	-0.3 IV		
Mean.....	-0.10		
Corr.	-0.29		

φ Leonis			
9 ^h 38 ^m 17 ^s	+14° 28' 44".97		
1903 Apr. 18 E.	+0.1 II		
1904 Apr. 16 L.	+0.6 III		
18 L.	+0.7 III		
1906 Apr. 2 L.	+0.3 IV		
3 L.	+0.6 IV		
Mean.....	+0.46		
Corr.	-0.24		

θ Antliae			
9 ^h 39 ^m 45 ^s	-27° 18' 41".34		
1903 Mar. 31 E.	+0.4 II		
1905 Mar. 28 L.	+0.5 III		
Apr. 3 L.	-0.1 III		
1906 Apr. 6 L.	+0.6 IV		
12 L.	+0.4 IV		
Mean.....	+0.36		
Corr.	-0.63		

ε Leonis			
9 ^h 40 ^m 11 ^s	+24° 14' 5".02		
1899 Apr. 20 H.	+0.3 I		
23 H.	[+1.8] I		
1905 Apr. 16 L.	-1.1 III		
17 L.	-0.3 III		
1907 Apr. 11 L.	0.0 IV		
12 L.	-0.2 IV		
Mean.....	-0.26		
Corr.	-0.11		

14 Leonis Minoris			
9 ^h 40 ^m 19 ^s	+45° 34' "		
1903 Apr. 10 E.	44.14 II		
1905 Apr. 7 L.	42.90 III		
9 L.	43.26 III		
1906 Apr. 13 L.	43.30 IV		
16 L.	43.23 IV		
Mean.....	+45 34 43.37		
Corr.	+0.18		

υ Ursæ Majoris $9^h 43^m 53^s +59^\circ 30' 32''.21$			83 B. Leonis $9^h 51^m 8^s +9^\circ 24' 25''.88$			η Leonis $10^h 1^m 53^s +17^\circ 15' 1''.45$			22 Sextantis $10^h 12^m 40^s -7^\circ 34' 10''.14$		
1904 May 2 L.	-1.0	III	1903 Mar. 26 E.	-0.6	II	1904 Apr. 14 L.	+0.2	III	1903 Apr. 4 E.	-0.1	II
4 L.	-0.4	III	31 E.	+1.0	II	16 L.	-0.4	III	6 E.	+0.7	II
1907 Mar. 28 L.	-0.8	IV	Apr. 17 H.	-0.5	II	1907 Apr. 3 L.	-0.4	IV	1904 Apr. 16 L.	+1.2	III
29 L.	-0.3	IV	1904 Apr. 14 L.	+0.5	III	11 L.	-0.2	IV	18 L.	+1.0	III
Mean.....	-0.62		16 L.	-0.2	III	Mean.....	-0.20		1906 Apr. 18 L.	+1.0	IV
Corr.	+0.37		1906 Apr. 3 L.	0.0	IV	Corr.	-0.20		19 L.	+0.5	IV
			12 L.	-0.2	IV				Mean.....	+0.72	
			Mean.....	0.00					Corr.	-0.48	
			Corr.	-0.30							
23 Leonis $9^h 45^m 37^s +13^\circ 32' "$			19 Leonis Minoris $9^h 51^m 34^s +41^\circ 31' 55''.00$			α Leonis $10^h 3^m 3^s +12^\circ 27' 21''.72$			138 B. Ursæ Majoris $10^h 14^m 3^s +54^\circ 43' "$		
1903 Mar. 18 E.	2.13	II	1899 Apr. 20 H.	-0.7	I	1899 Apr. 9 H.	+1.4	I	1903 Apr. 10 E.	5.57	II
25 E.	0.98	II	23 H.	-1.4	I	20 H.	+0.2	I	May 4 E.	6.24	II
Apr. 4 E.	1.67	II	1904 Apr. 18 L.	+0.1	III	28 H.	+2.0	I	1904 Apr. 5 L.	7.25	III
29 E.	2.08	II	30 L.	+0.1	III	May 4 H.	+0.2	I	14 L.	6.77	III
1904 Apr. 1 L.	1.24	III	1907 Apr. 3 L.	-0.5	IV	1904 Apr. 18 L.	+0.8	III	1906 Apr. 3 L.	7.15	IV
4 L.	1.50	III	11 L.	-0.4	IV	20 L.	+0.7	III	12 L.	7.27	IV
1905 Apr. 18 L.	1.38	III	12 L.	-0.2	IV	12 L.	+0.2	IV	Mean.....	+54	43 6.71
1906 Apr. 18 L.	2.08	IV	Mean.....	-0.43		15 L.	+0.8	IV	Corr.	+0.31	
19 L.	2.03	IV	Corr.	+0.13		Mean.....	+0.79				
Mean.....	+13 32	1.68				Corr.	-0.26				
Corr.	-0.25										
6 Sextantis $9^h 46^m 12^s -3^\circ 46' 28''.57$			ν Leonis $9^h 52^m 51^s +12^\circ 55' 18''.30$			λ Hydræ $10^h 5^m 43^s -11^\circ 51' 35''.28$			γ Leonis (1st star) $10^h 14^m 28^s +20^\circ 20' 50''.41$		
1904 Mar. 25 L.	-1.6	III	1903 Apr. 6 E.	+1.1	II	1904 Apr. 4 L.	+0.1	III	1899 Apr. 9 H.	+0.4	I
29 L.	-0.7	III	28 E.	+1.3	II	30 L.	+0.6	III	24 H.	+0.1	I
1906 Apr. 24 L.	-0.6	IV	1905 Apr. 3 L.	-0.6	III	1906 Apr. 13 L.	+0.1	IV	28 H.	+1.4	I
28 L.	-0.1	IV	7 L.	+1.0	III	16 L.	+0.2	IV	May 4 H.	+1.6	I
Mean.....	-0.75		1906 Apr. 13 L.	+0.5	IV	Mean.....	+0.25		1904 Apr. 20 L.	-0.4	III
Corr.	-0.44		16 L.	+0.6	IV	Corr.	-0.52		30 L.	0.0	III
			Mean.....	+0.65					1907 Apr. 3 L.	-0.2	IV
			Corr.	-0.26					11 L.	-0.9	IV
μ Leonis $9^h 47^m 5^s +26^\circ 28' 40''.64$			π Leonis $9^h 54^m 56^s +8^\circ 31' 26''.61$			32 Ursæ Majoris $10^h 10^m 47^s +65^\circ 36' 26''.22$			29 H. Camelopardalis $10^h 15^m 9^s +84^\circ 45' 36''.81$		
1899 Apr. 28 H.	+1.2	I	1905 Apr. 16 L.	+0.1	III	1904 Nov. 28 L.	-0.1	III	1903 Apr. 18 E.	-0.7	II
1904 Apr. 5 L.	0.0	III	17 L.	-0.4	III	30 L.	-0.2	III	May 6 E.	-1.5	II
9 L.	+0.1	III	1906 Apr. 18 L.	+0.3	IV	1906 Nov. 29 L.	-0.1	IV	1904 May 7 L.	-0.5	III
1907 Apr. 15 L.	+0.4	IV	19 L.	0.0	IV	Dec. 3 L.	-0.2	IV	11 L.	-1.5	III
17 L.	-0.2	IV	1907 Apr. 27 L.	+0.2	IV	Mean.....	-0.15		Nov. 30 L.	-1.1	III
Mean.....	+0.30		29 L.	-0.1	IV	Corr.	+0.44		Dec. 6 L.	-1.3	III
Corr.	-0.08		Mean.....	+0.02					Mean.....	-1.12	
			Corr.	-0.31					Corr.	+0.66	
109 B. Ursæ Majoris $9^h 49^m 27^s +73^\circ 21' 18''.01$			193 G. Hydræ $9^h 59^m 44^s -23^\circ 48' "$			32 Ursæ Majoris s. p. $10^h 10^m 47^s +65^\circ 36' 26''.22$			29 H. Camelopardalis s. p. $10^h 15^m 9^s +84^\circ 45' 36''.79$		
1904 Nov. 16 L.	-0.2	III	1903 Apr. 4 E.	3.56	II	1904 Nov. 28 L.	+1.1	III	1903 Nov. 2 H.	+1.1	II
21 L.	+0.2	III	May 4 E.	4.26	II	Dec. 1 L.	-0.1	III	1904 Dec. 1 L.	+1.7	III
1906 Nov. 16 L.	+0.2	IV	1904 Apr. 5 L.	3.60	III	1906 Nov. 29 L.	+1.2	IV	8 L.	+0.9	III
22 L.	+0.1	IV	9 L.	5.30	III	Dec. 2 L.	+3.4	IV	Mean.....	+1.23	
Mean.....	+0.08		1905 Apr. 18 L.	4.03	III	Mean.....	+1.40		Corr.	-0.75	
Corr.	+0.54		1906 Apr. 3 L.	4.72	IV	Corr.	-0.85				
			12 L.	4.90	IV						
			1907 Apr. 17 L.	4.97	IV	λ Ursæ Majoris $10^h 11^m 4^s +43^\circ 24' 40''.73$			μ Ursæ Majoris $10^h 16^m 22^s +42^\circ 0' 9''.31$		
			24 L.	3.72	IV	1899 Apr. 23 H.	[+2.2]	I	1904 Mar. 25 L.	-0.1	III
			Mean.....	-23 48 4.46		1905 Apr. 16 L.	-0.9	III	29 L.	+0.9	III
			Corr.	-0.61		17 L.	-0.8	III	1907 Apr. 12 L.	-0.1	IV
						1907 Apr. 27 L.	-0.8	IV	15 L.	+0.3	IV
						29 L.	-0.8	IV	Mean.....	+0.25	
						Mean.....	-0.82		Corr.	+0.13	
						Corr.	+0.15				
109 B. Ursæ Majoris s. p. $9^h 49^m 27^s +73^\circ 21' 18''.01$			υ² Hydræ $10^h 0^m 15^s -12^\circ 34' 47''.22$			ζ Leonis $10^h 11^m 8^s +23^\circ 54' 56''.60$					
1904 Nov. 14 L.	-0.3	III	1903 Mar. 26 E.	+0.5	II	1905 Apr. 3 L.	+0.1	III			
21 L.	+0.2	III	31 E.	+1.1	II	7 L.	-0.9	III			
1906 Nov. 21 L.	+1.1	IV	Apr. 10 E.	+1.8	II	1907 Apr. 17 L.	-0.4	IV			
22 L.	-0.2	IV	1904 Mar. 29 L.	+0.6	III	24 L.	-0.3	IV			
Mean.....	+0.20		Apr. 1 L.	+1.2	III	Mean.....	-0.38				
Corr.	-0.82		1906 Apr. 24 L.	+1.3	IV	Corr.	-0.11				
			28 L.	+1.5	IV						
			Mean.....	+1.14							
			Corr.	-0.53							

42 Leonis 10 ^h 16 ^m 28 ^s +15° 28' "		α Antliae 10 ^h 22 ^m 35 ^s -30° 33' 31".59		44 Hydrae 10 ^h 29 ^m 15 ^s -23° 13' "		39 Ursae Majoris 10 ^h 37 ^m 25 ^s +57° 43' "	
1903 Apr. 27 E.	47.71 II	1904 Apr. 16 L.	+1.1 III	1903 Apr. 10 E.	46.82 II	1903 Apr. 28 E.	25.57 II
29 E.	48.55 II	18 L.	+0.9 III	18 E.	45.73 II	May 11 E.	25.39 II
1904 Apr. 1 L.	46.71 III	1906 Apr. 18 L.	+1.3 IV	May 6 E.	45.38 II	1904 May 16 L.	26.62 III
4 L.	47.16 III	19 L.	+1.0 IV	1904 Apr. 4 L.	47.23 III	1905 Apr. 6 L.	26.69 III
1906 Apr. 13 L.	47.66 IV	Mean.....	+1.08	20 L.	46.15 III	1906 May 2 L.	26.35 IV
16 L.	47.62 IV	Corr.	-0.65	1906 Apr. 13 L.	46.67 IV	4 L.	26.75 IV
Mean.....	+15 28 47.57	36 Ursae Majoris 10 ^h 24 ^m 14 ^s +56° 29' 35".98		16 L.	46.24 IV	Mean.....	+57 43 26.23
Corr.	-0.22	1904 May 12 L.	-0.2 III	Mean.....	-23 13 46.32	Corr.	+0.34
30 H. Ursae Majoris 10 ^h 16 ^m 56 ^s +66° 4' 19".72		16 L.	+0.4 III	Corr.	-0.61		
1904 Nov. 16 L.	-1.1 III	1907 Apr. 3 L.	+0.6 IV	48 Leonis 10 ^h 29 ^m 35 ^s +7° 28' 7".12		1903 Apr. 29 E.	-0.2 II
21 L.	-0.8 III	11 L.	+1.0 IV	1903 Apr. 4 E.	+0.4 II	May 6 E.	+0.1 II
1906 Nov. 16 L.	-0.5 IV	Mean.....	+0.45	17 H.	+1.1 II	1905 Apr. 7 L.	-0.7 III
22 L.	-0.4 IV	Corr.	+0.33	1905 Apr. 6 L.	+0.7 III	9 L.	-0.5 III
Mean.....	-0.70	29 Sextantis 10 ^h 24 ^m 24 ^s -2° 13' 37".12		7 L.	+0.9 III	1907 Apr. 11 L.	-0.3 IV
Corr.	+0.45	1904 Apr. 5 L.	-0.1 III	1907 Apr. 29 L.	+0.4 IV	12 L.	+0.3 IV
30 H. Ursae Majoris s. p. 10 ^h 16 ^m 56 ^s +66° 4' 19".72		1906 Apr. 24 L.	-0.8 IV	May 4 L.	+1.1 IV	Mean.....	-0.22
1904 Nov. 21 L.	+0.6 III	28 L.	-1.1 IV	Mean.....	+0.77	Corr.	-0.36
23 L.	+0.4 III	Mean.....	-0.67	Corr.	-0.32		
1906 Nov. 21 L.	+0.2 IV	Corr.	-0.43	37 Leonis Minoris 10 ^h 33 ^m 6 ^s +32° 29' 45".22		1899 Apr. 9 H.	-0.1 I
22 L.	+2.5 IV	9 H. Draconis 10 ^h 26 ^m 36 ^s +76° 13' 41".47		1903 Apr. 21 E.	-1.1 II	20 H.	-0.8 I
Mean.....	+0.92	1899 May 4 H.	-1.1 I	May 1 E.	-1.0 II	28 H.	-0.4 I
Corr.	-0.85	1904 May 7 L.	-0.8 III	1905 Apr. 16 L.	-0.5 III	1905 Apr. 16 L.	-0.6 III
30 H. Camelopardalis 10 ^h 18 ^m 55 ^s +83° 4' 2".83		11 L.	-1.0 III	18 L.	-0.4 III	17 L.	-0.2 III
1904 Nov. 23 L.	-0.2 III	Nov. 21 L.	-0.3 III	1906 Apr. 18 L.	-0.6 IV	1907 Apr. 15 L.	0.0 IV
28 L.	+0.1 III	23 L.	-0.8 III	19 L.	-0.9 IV	17 L.	0.0 IV
1906 May 2 L.	-1.0 IV	1906 Nov. 16 L.	-0.1 IV	1907 Apr. 24 L.	-0.3 IV	Mean.....	-0.30
4 L.	-0.7 IV	22 L.	-0.6 IV	Mean.....	-0.69	Corr.	-0.12
Mean.....	-0.45	Mean.....	-0.67	Corr.	0.00		
Corr.	+0.64	Corr.	+0.57	35 H. Ursae Majoris 10 ^h 35 ^m 55 ^s +69° 35' 56".85		42 Leonis Minoris 10 ^h 40 ^m 18 ^s +31° 12' 32".42	
30 H. Camelopardalis s. p. 10 ^h 18 ^m 55 ^s +83° 4' 2".82		9 H. Draconis s. p. 10 ^h 26 ^m 36 ^s +76° 13' 41".46		1904 Apr. 5 L.	+0.4 III	1904 May 11 L.	+0.5 III
1903 Oct. 20 H.	-0.9 II	1903 Oct. 19 H.	-0.4 II	Nov. 23 L.	+2.0 III	12 L.	+0.8 III
Nov. 3 H.	-0.4 II	Nov. 2 H.	+0.8 II	28 L.	+0.2 III	1907 May 11 L.	-0.9 IV
12 H.	+1.2 II	1904 Nov. 21 L.	+0.7 III	1906 Nov. 22 L.	+0.5 IV	13 L.	0.0 IV
1904 Nov. 28 L.	+0.3 III	23 L.	+0.4 III	29 L.	+0.8 IV	Mean.....	+0.10
30 L.	+1.2 III	1906 Nov. 21 L.	+0.2 IV	Mean.....	+0.78	Corr.	-0.02
Mean.....	+0.28	23 L.	+0.9 IV	Corr.	+0.49		
Corr.	-0.76	Mean.....	+0.43	35 H. Ursae Majoris s. p. 10 ^h 35 ^m 55 ^s +69° 35' 56".84		37 Sextantis 10 ^h 40 ^m 53 ^s +6° 54' 0".64	
μ Hydrae 10 ^h 21 ^m 15 ^s -16° 19' 32".82		ρ Leonis 10 ^h 27 ^m 33 ^s +9° 49' 16".66		1904 Nov. 23 L.	+2.5 III	1903 Apr. 4 E.	+0.2 II
1899 Apr. 20 H.	+1.1 I	1904 May 2 L.	+0.6 III	28 L.	+1.2 III	10 E.	+0.3 II
1905 Apr. 3 L.	+0.2 III	4 L.	+1.0 III	1906 Nov. 21 L.	+0.8 IV	May 4 E.	+1.0 II
17 L.	-1.0 III	1907 Apr. 12 L.	0.0 IV	29 L.	+1.8 IV	1904 Apr. 1 L.	-0.8 III
1907 Apr. 17 L.	+1.0 IV	15 L.	-0.1 IV	Mean.....	+1.58	4 L.	-0.5 III
24 L.	+2.2 IV	Mean.....	+0.38	Corr.	-0.84	1906 Apr. 18 L.	-0.1 IV
Mean.....	+0.70	Corr.	-0.29			19 L.	0.0 IV
Corr.	-0.56	37 Ursae Majoris 10 ^h 28 ^m 43 ^s +57° 35' 52".24		33 Sextantis 10 ^h 36 ^m 19 ^s -1° 12' 56".95		Mean.....	+0.01
31 Leonis Minoris 10 ^h 22 ^m 6 ^s +37° 13' 10".24		1904 Mar. 29 L.	-1.2 III	1904 Apr. 16 L.	-0.7 III	Corr.	-0.33
1905 Apr. 9 L.	-0.7 III	Apr. 1 L.	-0.3 III	18 L.	-0.1 III		
16 L.	+0.1 III	1907 May 11 L.	-0.1 IV	1906 Apr. 24 L.	-0.3 IV	1899 May 14 H.	+1.0 I
1907 Apr. 29 L.	+0.1 IV	13 L.	0.0 IV	28 L.	-0.4 IV	15 H.	+1.0 I
May 4 L.	+0.1 IV	Mean.....	-0.40	Mean.....	-0.38	1904 Apr. 20 L.	+0.1 III
Mean.....	-0.06	Corr.	+0.34	Corr.	-0.42	May 2 L.	+0.6 III
Corr.	+0.07					4 L.	+0.7 III
						1907 Apr. 24 L.	+0.3 IV
						29 L.	-0.3 IV
						Mean.....	+0.49
						Corr.	-0.28

ν Hydrae			α Crateris			β^4 Leonis			237 B. Ursae Majoris		
10 ^h 44 ^m 41 ^s -15° 40' 11".27			10 ^h 54 ^m 54 ^s -17° 45' 58".31			11 ^h 1 ^m 48 ^s +2° 29' 54".36			11 ^h 11 ^m 4 ^s +50° 1' 19".15		
1904 May 7 L. -0.3 III			1903 Apr. 18 E. +0.9 II			1899 Apr. 20 H. -1.2 I			1904 May 7 L. +0.3 III		
10 L. +0.6 III			29 E. +0.9 II			28 H. -1.2 I			10 L. +0.6 III		
1907 May 4 L. +1.2 IV			May 5 E. +2.3 II			1904 Apr. 16 L. +0.5 III			1906 Apr. 28 L. -0.2 IV		
14 L. +0.3 IV			1904 May 2 L. +1.3 III			1907 Apr. 24 L. +0.5 IV			May 2 L. -0.1 IV		
			4 L. +1.0 III			29 L. +0.1 IV					
Mean..... +0.45			1906 Apr. 16 L. +1.1 IV			Mean..... -0.26			Mean..... +0.15		
Corr. -0.55			18 L. +0.9 IV			Corr. -0.38			Corr. +0.24		
			Mean..... +1.20								
			Corr. -0.57								
46 Leonis Minoris			d Leonis			ϕ Ursae Majoris			ϕ Leonis		
10 ^h 47 ^m 43 ^s +34° 45' 13".94			10 ^h 55 ^m 24 ^s +4° 9' 15".88			11 ^h 4 ^m 3 ^s +45° 2' 28".06			11 ^h 11 ^m 35 ^s -3° 6' 17".54		
1899 Apr. 9 H. -1.8 I			1903 Apr. 27 E. +1.1 II			1899 May 15 H. -0.2 I			1903 Apr. 17 H. +0.3 II		
24 H. -0.6 I			May 1 E. +1.3 II			1905 Apr. 16 L. -0.2 III			27 E. +0.6 II		
May 4 H. -0.8 I			11 E. +2.2 II			17 L. -0.2 III			May 4 E. +0.2 II		
1904 Apr. 16 L. +0.1 III			12 E. +1.7 II			1906 May 4 L. -0.9 IV			9 H. +0.4 II		
18 L. -0.7 III			1904 May 7 L. +0.5 III			8 L. +0.2 IV			11 E. +1.0 II		
1906 Apr. 24 L. -0.9 IV			10 L. +1.8 III			Mean..... -0.26			13 E. +1.1 II		
28 L. -0.4 IV			1906 Apr. 19 L. +0.4 IV			Corr. +0.17			19 E. +0.8 II		
Mean..... -0.73			24 L. +0.4 IV						21 E. +0.7 II		
Corr. +0.03			Mean..... +1.18						1904 Apr. 4 L. -0.6 III		
			Corr. -0.36						5 L. +0.1 III		
									1907 Apr. 15 L. +0.1 IV		
									17 L. 0.0 IV		
									Mean..... +0.39		
									Corr. -0.44		

249 B. Ursæ Majoris
11^h 16^m 55^s +64° 52' 40".24

1904 Dec. 15 L.	+0.3	III
17 L.	0.0	III
Mean.....	+0.15	
Corr.	+0.44	

249 B. Ursæ Majoris s. p.
11^h 16^m 55^s +64° 52' 40".24

1904 Dec. 14 L.	+3.1	III
16 L.	+2.3	III
Mean.....	+2.70	
Corr.	-0.86	

Leonis
11^h 18^m 43^s +11° 4' 47".98

1904 May 21 L.	+0.1	III
23 L.	+0.1	III
1907 May 14 L.	+0.1	IV
17 L.	-0.2	IV
Mean.....	+0.02	
Corr.	-0.28	

Crateris
11^h 19^m 53^s -17° 8' 4".84

1904 May 16 L.	+0.8	III
20 L.	+1.2	III
1906 May 12 L.	+0.9	IV
16 L.	+0.5	IV
1907 May 20 L.	+0.1	IV
Mean.....	+0.70	
Corr.	-0.56	

83 Leonis
11^h 21^m 42^s +3° 33' 30".50

1903 Apr. 18 E.	-1.0	II
21 E.	-0.6	II
28 E.	-1.3	II
May 1 E.	-0.9	II
11 E.	-0.5	II
12 E.	-0.7	II
15 H.	[+2.8]	II
21 E.	-0.9	II
1904 May 4 L.	-0.9	III
7 L.	-0.2	III
1906 Apr. 24 L.	-0.3	IV
28 L.	-0.2	IV
May 2 L.	-0.3	IV
Mean.....	-0.65	
Corr.	-0.37	

Leonis
11^h 22^m 48^s +3° 24' 25".30

1899 May 9 H.	+0.8	I
11 H.	-0.3	I
20 H.	+0.6	I
1904 May 10 L.	0.0	III
12 L.	+0.6	III
1907 Apr. 15 L.	-0.3	IV
17 L.	-0.6	IV
May 4 L.	-0.6	IV
Mean.....	+0.02	
Corr.	-0.37	

58 Ursæ Majoris
11^h 25^m 7^s +43° 43' 19".86

1904 Apr. 20 L.	+0.7	III
May 2 L.	+0.7	III
1907 Apr. 24 L.	+0.1	IV
29 L.	+0.2	IV
Mean.....	+0.42	
Corr.	+0.16	

Leonis
11^h 25^m 12^s -2° 27' 5".78

1902 May 15 H.	+1.3	I
1903 Apr. 17 H.	+0.5	II
27 E.	-0.1	II
May 4 E.	-0.5	II
8 H.	-0.1	II
13 E.	+0.3	II
19 E.	-0.2	II
1904 Apr. 14 L.	-0.5	III
16 L.	-0.2	III
18 L.	+0.1	III
1906 May 8 L.	+0.6	IV
18 L.	+0.9	IV
Mean.....	+0.18	
Corr.	-0.43	

Draconis
11^h 25^m 28^s +69° 52' 58".85

1899 May 14 H.	-0.3	I
15 H.	[-2.8]	I
1904 Dec. 13 L.	+0.3	III
1906 Nov. 29 L.	-0.1	IV
Dec. 3 L.	+0.2	IV
Mean.....	+0.02	
Corr.	+0.50	

Draconis s. p.
11^h 25^m 28^s +69° 52' 58".82

1904 Dec. 8 L.	-0.2	III
12 L.	+1.2	III
1906 Nov. 29 L.	+0.5	IV
Dec. 2 L.	+0.4	IV
Mean.....	+0.48	
Corr.	-0.84	

Hydræ
11^h 28^m 5^s -31° 18' 15".88

1904 May 23 L.	0.0	III
1905 Apr. 16 L.	-0.1	III
1907 May 9 L.	+1.2	IV
11 L.	+0.4	IV
13 L.	+1.2	IV
14 L.	+0.7	IV
Mean.....	+0.57	
Corr.	-0.65	

Leonis
11^h 31^m 50^s -0° 16' 17".62

1899 Apr. 20 H.	+0.6	I
May 4 H.	+0.3	I
9 H.	+1.2	I
20 H.	+1.5	I
1904 May 20 L.	+0.1	III
21 L.	+0.7	III
1906 May 2 L.	-0.4	IV
4 L.	0.0	IV
Mean.....	+0.50	
Corr.	-0.41	

Hydræ
11^h 35^m 15^s -34° 11' "

1903 Apr. 27 E.	23.62	II
May 1 E.	26.00	II
12 E.	24.47	II
1904 Apr. 14 L.	24.30	III
18 L.	23.99	III
1906 Apr. 24 L.	24.55	IV
28 L.	23.95	IV
1907 May 17 L.	23.90	IV
20 L.	24.40	IV
Mean.....	-34 11 24.35	
Corr.	-0.67	

Draconis
11^h 36^m 54^s +67° 17' 54".34

1904 Dec. 15 L.	-0.1	III
17 L.	+0.2	III
1906 Dec. 3 L.	-0.2	IV
18 L.	-0.4	IV
Mean.....	-0.12	
Corr.	+0.47	

Draconis s. p.
11^h 36^m 54^s +67° 17' 54".34

1904 Dec. 14 L.	+1.8	III
16 L.	+0.8	III
1906 Dec. 4 L.	+1.2	IV
11 L.	+0.9	IV
Mean.....	+1.18	
Corr.	-0.85	

Crateris
11^h 39^m 42^s -17° 47' 41".26

1903 Apr. 17 H.	+0.9	II
May 2 H.	+0.2	II
8 H.	+1.5	II
10 H.	+0.4	II
17 H.	+0.9	II
1904 May 2 L.	+1.1	III
4 L.	+1.6	III
1906 May 12 L.	+1.2	IV
16 L.	+1.1	IV
Mean.....	+0.99	
Corr.	-0.57	

Virginis
11^h 40^m 43^s +7° 5' 22".49

1903 Apr. 29 E.	0.0	II
May 5 E.	+1.0	II
9 H.	0.0	II
19 E.	+0.1	II
22 E.	+0.9	II
1904 May 7 L.	0.0	III
10 L.	0.0	III
1907 Apr. 15 L.	0.0	IV
29 L.	-0.4	IV
Mean.....	+0.18	
Corr.	-0.33	

Ursæ Majoris
11^h 40^m 46^s +48° 20' 2".11

1899 May 11 H.	0.0	I
15 H.	-1.0	I
1904 May 12 L.	+0.3	III
16 L.	0.0	III
1907 Apr. 24 L.	0.0	IV
May 4 L.	-0.8	IV
Mean.....	-0.25	
Corr.	+0.22	

Hydræ
11^h 43^m 42^s -26° 11' "

1903 May 1 E.	36.42	II
4 E.	35.32	II
12 E.	36.29	II
13 E.	35.59	II
1904 May 20 L.	35.39	III
21 L.	35.84	III
1906 May 4 L.	35.93	IV
8 L.	35.77	IV
Mean.....	-26 11 35.82	
Corr.	-0.63	

Leonis
11^h 43^m 58^s +15° 7' 51".56

1899 May 9 H.	+1.1	I
14 H.	+0.7	I
28 H.	+1.1	I
1904 May 23 L.	+0.6	III
27 L.	+0.6	III
1907 May 13 L.	-0.1	IV
14 L.	+0.3	IV
Mean.....	+0.61	
Corr.	-0.23	

Virginis
11^h 45^m 29^s +2° 19' 40".37

1904 Apr. 18 L.	+1.5	III
20 L.	+0.3	III
1907 May 9 L.	-0.1	IV
11 L.	+0.5	IV
Mean.....	+0.55	
Corr.	-0.38	

Groombridge 1830
11^h 47^m 13^s +38° 25' 38".06

1904 Apr. 16 L.	-1.3	III
1906 Apr. 24 L.	-0.8	IV
May 2 L.	-1.2	IV
Mean.....	-1.10	
Corr.	+0.08	

Ursæ Majoris
11^h 48^m 34^s +54° 15' 2".81

1899 May 11 H.	[+2.1]	I
20 H.	-0.7	I
1904 May 28 L.	-0.5	III
1907 May 17 L.	-0.6	IV
20 L.	-0.8	IV
Mean.....	-0.65	
Corr.	+0.30	

Leonis
11^h 50^m 32^s +16° 12' 11".71

1903 Apr. 27 E.	-0.1	II
29 E.	-0.3	II
May 7 H.	+1.1	II
8 H.	+0.8	II
10 H.	+0.1	II
17 H.	+1.3	II
1904 May 2 L.	0.0	III
4 L.	+0.9	III
1905 May 18 L.	+0.5	III
1906 May 12 L.	+0.9	IV
16 L.	+0.5	IV
Mean.....	+0.52	
Corr.	-0.21	

b Virginis
 $11^h 54^m 50^s +4^{\circ} 12' 44''.03$

1903 Apr. 17 H.	0.0	II
May 1 E.	-1.1	II
2 H.	-0.7	II
4 E.	-1.0	II
9 H.	-0.3	II
12 E.	-0.3	II
15 H.	+0.5	II
1904 May 7 L.	-0.7	III
10 L.	0.0	III
1906 May 8 L.	+0.1	IV
Mean.....	-0.35	
Corr.....	-0.36	

π Virginis
 $11^h 55^m 45^s +7^{\circ} 10' 18''.90$

1899 Apr. 19 H.	-0.1	I
May 14 H.	+0.2	I
15 H.	+0.1	I
1904 May 12 L.	+0.8	III
16 L.	+1.1	III
1907 Apr. 24 L.	+0.2	IV
29 L.	+0.6	IV
Mean.....	+0.41	
Corr.....	-0.33	

δ Camelopardalis
 $11^h 59^m 43^s +86^{\circ} 8' "$

1902 May 20 H.	26.55	I
1903 Apr. 28 E.	29.06	II
29 E.	28.57	II
May 5 E.	28.98	II
6 E.	27.68	II
11 E.	28.26	II
20 E.	28.88	II
21 E.	28.61	II
1904 Dec. 13 L.	28.25	III
15 L.	28.22	III
Mean.....	+86 8 28.31	
Corr.....	+0.67	

δ Camelopardalis s. p.
 $11^h 59^m 43^s +86^{\circ} 8' "$

1904 Dec. 14 L.	31.16	III
16 L.	30.74	III
Mean.....	+86 8 30.95	
Corr.....	-0.74	

δ Virginis
 $12^h 0^m 7^s +0^{\circ} 17' 18''.28$

1899 Apr. 20 H.	+1.0	I
May 11 H.	+1.1	I
25 H.	+1.1	I
1904 Apr. 18 L.	+1.6	III
20 L.	+0.8	III
1906 Apr. 24 L.	+0.5	IV
May 2 L.	+0.5	IV
4 L.	+0.8	IV
Mean.....	+0.92	
Corr.....	-0.30	

δ Draconis
 $12^h 0^m 10^s +77^{\circ} 27' 53''.31$

1904 Dec. 17 L.	-0.3	III
20 L.	-0.7	III
1906 Dec. 18 L.	0.0	IV
Mean.....	-0.13	
Corr.....	+0.58	

δ Draconis s. p.
 $12^h 0^m 10^s +77^{\circ} 27' 53''.31$

1904 Dec. 20 L.	+0.8	III
21 L.	+1.7	III
1906 Dec. 23 L.	+1.7	IV
Mean.....	+1.40	
Corr.....	-0.80	

δ Virginis
 $12^h 4^m 34^s +2^{\circ} 27' "$

1903 Apr. 27 E.	34.26	II
May 1 E.	34.49	II
4 E.	33.89	II
10 H.	34.20	II
12 E.	34.32	II
28 E.	34.96	II
1904 May 20 L.	34.28	III
21 L.	33.61	III
28 L.	33.91	III
1905 May 8 L.	33.75	III
12 L.	33.33	III
1906 May 8 L.	33.14	IV
12 L.	33.20	IV
Mean.....	+2 27 33.95	
Corr.....	-0.38	

ϵ Corvi
 $12^h 4^m 59^s -22^{\circ} 3' 48''.94$

1899 May 15 H.	+1.2	I
20 H.	+1.3	I
1904 May 23 L.	+1.3	III
June 4 L.	+0.8	III
1907 May 4 L.	+3.4	IV
9 L.	+2.2	IV
11 L.	+1.1	IV
13 L.	+1.6	IV
Mean.....	+1.61	
Corr.....	-0.60	

δ Draconis
 $12^h 7^m 31^s +78^{\circ} 10' 19''.03$

1899 May 14 H.	-0.8	I
1905 Jan. 8 L.	-0.5	III
12 L.	-0.2	III
May 19 L.	0.0	III
Mean.....	-0.38	
Corr.....	+0.59	

δ Draconis s. p.
 $12^h 7^m 31^s +78^{\circ} 10' 19''.07$

1905 Jan. 1 L.	+1.7	III
Dec. 13 L.	+0.6	III
Mean.....	+1.15	
Corr.....	-0.79	

δ Canum Venaticorum
 $12^h 9^m 40^s +53^{\circ} 59' 28''.41$

1903 Apr. 29 E.	+1.1	II
May 5 E.	+0.5	II
7 H.	-2.0	II
15 H.	-0.2	II
17 H.	-0.4	II
1904 May 10 L.	-1.0	III
12 L.	-0.9	III
1905 May 18 L.	-0.6	III
1906 May 18 L.	-0.6	IV
21 L.	-0.1	IV
24 L.	-0.1	IV
Mean.....	-0.42	
Corr.....	+0.30	

δ Ursae Majoris
 $12^h 10^m 29^s +57^{\circ} 35' 17''.84$

1904 Apr. 20 L.	-0.4	III
May 2 L.	-1.1	III
1907 Apr. 24 L.	+0.1	IV
29 L.	0.0	IV
Mean.....	-0.35	
Corr.....	+0.34	

γ Corvi
 $12^h 10^m 40^s -16^{\circ} 59' 11''.64$

1899 May 25 H.	+2.8	I
1904 May 16 L.	+0.8	III
June 8 L.	+2.5	III
1907 May 14 L.	+1.4	IV
17 L.	+0.6	IV
20 L.	+1.0	IV
23 L.	+0.7	IV
Mean.....	+1.40	
Corr.....	-0.56	

δ Canum Venaticorum
 $12^h 11^m 7^s +41^{\circ} 13' 0''.21$

1899 May 24 H.	+0.7	I
1904 May 4 L.	-0.1	III
7 L.	+0.7	III
1906 Apr. 24 L.	+0.6	IV
28 L.	+0.1	IV
Mean.....	+0.40	
Corr.....	+0.12	

δ Ursae Minoris
 $12^h 13^m 56^s +86^{\circ} 59' "$

1903 May 1 E.	27.88	II
9 H.	28.19	II
12 E.	27.58	II
1904 Dec. 17 L.	29.64	III
1905 Jan. 8 L.	29.49	III
June 1 L.	28.76	III
1906 May 4 L.	29.20	IV
8 L.	29.02	IV
Mean.....	+86 59 28.72	
Corr.....	+0.68	

δ Ursae Minoris s. p.
 $12^h 13^m 56^s +86^{\circ} 59' "$

1904 Dec. 20 L.	30.31	III
1905 Jan. 1 L.	30.85	III
Mean.....	+86 59 30.58	
Corr.....	-0.73	

δ Ursae Minoris
 $12^h 14^m 23^s +88^{\circ} 15' 15''.48$

1903 Apr. 27 E.	-0.2	II
May 19 E.	-1.2	II
1905 Jan. 12 L.	-1.0	III
May 2 L.	-1.6	III
1906 Dec. 18 L.	-0.6	IV
Mean.....	-0.92	
Corr.....	+0.69	

δ Ursae Minoris s. p.
 $12^h 14^m 23^s +88^{\circ} 15' 15''.55$

1905 Jan. 2 L.	+0.4	III
Dec. 12 L.	+1.0	III
1906 Dec. 23 L.	+0.7	IV
Mean.....	+0.70	
Corr.....	-0.72	

η Virginis
 $12^h 14^m 47^s -0^{\circ} 6' 39''.91$

1899 May 9 H.	+0.5	I
11 H.	+0.8	I
1904 May 20 L.	-0.4	III
21 L.	+0.5	III
1907 May 11 L.	-0.3	IV
13 L.	+0.7	IV
Mean.....	+0.30	
Corr.....	-0.41	

ϵ Virginis
 $12^h 15^m 16^s +3^{\circ} 52' "$

1903 Apr. 28 E.	9.74	II
May 4 E.	10.04	II
28 E.	10.89	II
1904 May 23 L.	10.09	III
27 L.	9.31	III
1906 May 12 L.	10.49	IV
16 L.	9.61	IV
Mean.....	+3 52 10.02	
Corr.....	-0.36	

δ Comae Berenices
 $12^h 17^m 29^s +26^{\circ} 24' 4''.52$

1903 May 10 H.	-0.2	II
1904 May 28 L.	-1.9	III
June 4 L.	-1.9	III
1907 May 4 L.	-1.8	IV
9 L.	-0.9	IV
Mean.....	-1.34	
Corr.....	-0.08	

χ^2 Centauri
 $12^h 20^m 5^s -34^{\circ} 37' "$

1905 May 8 L.	55.42	III
18 L.	55.47	III
1907 May 14 L.	55.28	IV
June 3 L.	55.51	IV
Mean.....	-34 37 55.42	
Corr.....	-0.67	

δ Canum Venaticorum
 $12^h 20^m 55^s +39^{\circ} 34' 24''.71$

1905 May 22 L.	-0.4	III
24 L.	-0.5	III
1907 May 23 L.	-1.1	IV
June 5 L.	-1.4	IV
Mean.....	-0.85	
Corr.....	+0.10	

δ Comae Berenices
 $12^h 21^m 24^s +27^{\circ} 49' 20''.11$

1903 May 13 E.	-0.6	II
17 H.	-0.5	II
1904 Apr. 20 L.	+0.3	III
May 2 L.	+0.6	III
1906 May 2 L.	0.0	IV
21 L.	+0.9	IV
Mean.....	+0.12	
Corr.....	-0.06	

δ Hydrae
 $12^h 21^m 35^s -32^{\circ} 16' "$

1905 May 19 L.	32.72	III
20 L.	32.09	III
1906 Apr. 24 L.	31.76	IV
28 L.	31.20	IV
Mean.....	-32 16 31.94	
Corr.....	-0.66	

15 Comæ Berenices $12^h 21^m 57^s +28^\circ 49' 27''.09$		β Corvi $12^h 29^m 8^s -22^\circ 50' 37''.71$		γ Virginis $12^h 34^m 5^s -7^\circ 26' 43''.03$		d^2 Virginis $12^h 40^m 34^s +8^\circ 13' 11''.70$	
1903 May 21 E.	+0.4 II	1899 May 25 H.	+1.0 I	1902 June 6 H.	+1.3 I	1903 May 5 E.	+0.2 II
June 3 E.	+0.2 II	1905 May 2 L.	+1.1 III	1903 May 8 H.	+1.3 II	6 E.	+1.5 II
1904 May 4 L.	+0.1 III	8 L.	+0.3 III	June 4 E.	+0.9 II	June 3 E.	+1.2 II
7 L.	-0.1 III	1907 May 4 L.	+1.3 IV	1904 May 7 L.	+0.4 III	1905 May 12 L.	+1.3 III
1907 Apr. 24 L.	-0.3 IV	9 L.	+1.1 IV	12 L.	+1.3 III	20 L.	+1.5 III
29 L.	+0.9 IV	Mean.....	+0.96	1906 May 2 L.	+1.0 IV	22 L.	+1.4 III
Mean.....	+0.20	Corr.....	-0.61	4 L.	+0.7 IV	1907 May 9 L.	+1.6 IV
Corr.....	-0.05			8 L.	+0.5 IV	14 L.	+1.3 IV
				Mean.....	+0.92	23 L.	+1.2 IV
				Corr.....	-0.48	Mean.....	+1.24
						Corr.....	-0.31
33 H¹. Virginis $12^h 22^m 44^s -4^\circ 3' "$		κ Draconis $12^h 29^m 13^s +70^\circ 20' 22''.08$		γ Virginis (mean) $12^h 36^m 36^s -0^\circ 54' 3''.31$		35 Virginis $12^h 42^m 46^s +4^\circ 7' 7''.63$	
1903 May 8 H.	42.76 II	1899 June 2 H.	-1.6 I	1904 June 14 L.	+0.2 III	1903 May 7 H.	+0.1 II
1904 May 12 L.	41.88 III	1904 Dec. 20 L.	+0.5 III	1905 June 2 L.	+0.3 III	10 H.	+0.6 II
16 L.	42.31 III	1905 Jan. 8 L.	-0.1 III	1907 June 3 L.	-0.2 IV	13 E.	-0.2 II
1906 May 24 L.	42.26 IV	1906 Dec. 18 L.	-0.6 IV	5 L.	+0.3 IV	1904 May 2 L.	+0.6 III
25 L.	42.02 IV	26 L.	-0.9 IV	Mean.....	+0.15	4 L.	+0.2 III
Mean.....	-4 3 42.25	Mean.....	-0.54	Corr.....	-0.42	1906 May 24 L.	+0.6 IV
Corr.....	-0.45	Corr.....	+0.50			25 L.	+0.1 IV
						Mean.....	+0.29
						Corr.....	-0.36
δ Corvi $12^h 24^m 41^s -15^\circ 57' 31''.77$		κ Draconis S. P. $12^h 29^m 13^s +70^\circ 20' 22''.09$		ρ Virginis $12^h 36^m 49^s +10^\circ 47' 11''.50$		ϕ Centauri $12^h 45^m 16^s -33^\circ 27' "$	
1899 May 11 H.	+1.3 I	1904 Dec. 16 L.	+0.5 III	1903 May 11 E.	+0.5 II	1903 May 9 H.	13.70 II
14 H.	+2.7 I	1905 Jan. 1 L.	+0.3 III	15 H.	+0.3 II	11 E.	13.84 II
1904 May 10 L.	+0.8 III	1906 Dec. 23 L.	+0.4 IV	17 H.	+1.0 II	June 4 E.	12.51 II
20 L.	+0.8 III	Mean.....	+0.40	June 2 E.	+1.0 II	1904 May 7 L.	14.96 III
1907 May 17 L.	+0.7 IV	Corr.....	-0.84	1904 May 21 L.	+1.1 III	12 L.	13.19 III
20 L.	+1.1 IV			23 L.	+0.8 III	1906 May 18 L.	13.87 IV
Mean.....	+1.23			1907 Apr. 24 L.	+0.3 IV	21 L.	13.58 IV
Corr.....	-0.56			29 L.	+0.4 IV	Mean.....	-33 27 13.66
				Mean.....	+0.68	Corr.....	-0.66
				Corr.....	-0.28		
20 Comæ Berenices $12^h 24^m 42^s +21^\circ 26' 59''.37$		23 Comæ Berenices $12^h 29^m 52^s +23^\circ 10' 48''.15$		76 Ursæ Majoris $12^h 37^m 12^s +63^\circ 15' 43''.30$		31 Comæ Berenices $12^h 46^m 50^s +28^\circ 5' 5''.36$	
1903 May 5 E.	-0.1 II	1903 May 6 E.	+0.8 II	1904 May 27 L.	-0.6 III	1904 May 20 L.	+0.4 III
12 E.	+0.5 II	7 H.	+0.5 II	28 L.	-0.8 III	21 L.	-0.6 III
15 H.	-0.1 II	19 E.	+0.4 II	1907 May 11 L.	-0.2 IV	4 L.	-0.1 IV
1904 May 21 L.	+0.2 III	1905 May 12 L.	+0.3 III	13 L.	-0.8 IV	8 L.	-0.6 IV
23 L.	+0.2 III	19 L.	+0.2 III	June 6 L.	0.0 IV	1907 June 5 L.	-0.4 IV
1906 May 4 L.	-0.1 IV	1907 May 14 L.	+0.5 IV	Mean.....	-0.48	Mean.....	-0.26
8 L.	0.0 IV	23 L.	+0.9 IV	Corr.....	+0.42	Corr.....	-0.06
Mean.....	+0.09	Mean.....	+0.51				
Corr.....	-0.15	Corr.....	-0.12				
74 Ursæ Majoris $12^h 25^m 17^s +58^\circ 57' 21''.99$		24 Comæ Berenices $12^h 30^m 7^s +18^\circ 55' 39''.13$		330 G. Hydræ $12^h 38^m 41^s -27^\circ 46' "$		32² H. Camelopardalis $12^h 48^m 23^s +83^\circ 57' 23''.46$	
1904 May 27 L.	-0.1 III	1905 May 24 L.	+0.4 III	1903 May 12 E.	29.80 II	1903 May 12 E.	-1.3 II
28 L.	-0.5 III	June 1 L.	-0.4 III	21 E.	29.64 II	21 E.	-1.6 II
1907 May 11 L.	-1.0 IV	1906 May 18 L.	+0.2 IV	1904 June 4 L.	30.56 III	June 2 E.	-1.5 II
13 L.	-0.5 IV	21 L.	+0.7 IV	1905 May 2 L.	29.80 III	1905 May 24 L.	-1.8 III
Mean.....	-0.52	Mean.....	+0.22	1906 May 12 L.	29.91 IV	June 1 L.	-1.7 III
Corr.....	+0.36	Corr.....	-0.18	16 L.	30.40 IV	Mean.....	-1.58
				Mean.....	-27 46 30.02	Corr.....	+0.65
				Corr.....	-0.64		
8 Canum Venaticorum $12^h 29^m 0^s +41^\circ 54' 3''.84$		f Virginis $12^h 31^m 38^s -5^\circ 16' 50''.76$		Groombridge 1922 $12^h 40^m 26^s +45^\circ 59' "$		32² H. Camelopardalis S. P. $12^h 48^m 23^s +83^\circ 57' 23''.49$	
1899 May 20 H.	+0.8 I	1903 May 9 H.	+0.1 II	1899 June 8 H.	12.65 I	1905 Dec. 7 L.	+1.3 III
24 H.	-1.2 I	10 H.	-0.8 II	1903 May 28 E.	14.74 II	19 L.	+1.3 III
June 8 H.	-0.6 I	28 E.	-0.4 II	1905 May 8 L.	14.30 III	Mean.....	+1.30
1904 June 4 L.	-0.6 III	June 3 E.	+0.5 II	19 L.	13.35 III	Corr.....	-0.75
8 L.	-0.1 III	1904 May 2 L.	0.0 III	1907 May 17 L.	13.04 IV		
1906 May 12 L.	+0.1 IV	4 L.	+0.4 III	20 L.	13.40 IV		
16 L.	+0.6 IV	1906 Apr. 24 L.	+0.1 IV	Mean.....	+45 59 13.58		
Mean.....	-0.14	28 L.	-0.1 IV	Corr.....	+0.19		
Corr.....	+0.13	Mean.....	-0.02				
		Corr.....	-0.46				
9 Canum Venaticorum $12^h 33^m 58^s +41^\circ 25' 29''.78$		31 Comæ Berenices $12^h 46^m 50^s +28^\circ 5' 5''.36$		32² H. Camelopardalis S. P. $12^h 48^m 23^s +83^\circ 57' 23''.49$		32² H. Camelopardalis S. P. $12^h 48^m 23^s +83^\circ 57' 23''.49$	
1904 May 16 L.	-0.1 III	1904 May 20 L.	+0.4 III	1903 May 12 E.	-1.3 II	1905 Dec. 7 L.	+1.3 III
20 L.	-0.4 III	21 L.	-0.6 III	21 E.	-1.6 II	19 L.	+1.3 III
1906 May 24 L.	-1.0 IV	4 L.	+0.4 III	June 2 E.	-1.5 II	Mean.....	+1.30
25 L.	-0.9 IV	1906 Apr. 24 L.	+0.1 IV	1905 May 24 L.	-1.8 III	Corr.....	-0.75
Mean.....	-0.60	28 L.	-0.1 IV	June 1 L.	-1.7 III		
Corr.....	+0.12	Mean.....	-0.02				
		Corr.....	-0.46				

ψ Virginis
 $12^h 49^m 9^s -8^{\circ} 59' 45''.24$

1902 June 6 H.	+0.7 I
1903 May 5 E.	+0.8 II
8 H.	+1.7 II
17 H.	+1.1 II
1904 May 23 L.	+0.4 III
27 L.	+1.3 III
1906 May 12 L.	0.0 IV
16 L.	+0.7 IV
1907 June 6 L.	+1.4 IV
Mean.....	+0.90
Corr.	-0.50

ϵ Ursæ Majoris
 $12^h 49^m 38^s +56^{\circ} 30' 9''.31$

1904 June 14 L.	-0.6 III
17 L.	-0.2 III
1907 May 4 L.	-0.5 IV
20 L.	-1.0 IV
Mean.....	-0.58
Corr.	+0.33

δ Virginis
 $12^h 50^m 34^s +3^{\circ} 56' 26''.85$

1904 May 28 L.	+0.1 III
June 4 L.	0.0 III
1907 Apr. 29 L.	-0.1 IV
May 9 L.	+0.2 IV
Mean.....	+0.05
Corr.	-0.36

12 Canum Venaticorum
 $12^h 51^m 21^s +38^{\circ} 51' 30''.38$

1898 June 8 H.	+0.3 I
Oct. 19 H.	+0.9 I
Nov. 6 H.	+1.7 I
11 H.	+0.8 I
Dec. 1 H.	+0.1 I
1904 June 8 L.	-0.4 III
13 L.	-0.3 III
1907 May 14 L.	+0.3 IV
17 L.	+0.6 IV
Mean.....	+0.44
Corr.	+0.09

8 Draconis
 $12^h 51^m 30^s +65^{\circ} 58' 50''.96$

1905 Jan. 8 L.	+0.5 III
12 L.	+0.7 III
Mean.....	+0.60
Corr.	+0.45

8 Draconis S. P.
 $12^h 51^m 30^s +65^{\circ} 58' 50''.96$

1905 Jan. 1 L.	+0.9 III
14 L.	+0.9 III
Mean.....	+0.90
Corr.	-0.85

ϵ Virginis
 $12^h 57^m 12^s +11^{\circ} 29' 47''.84$

1899 June 20 H.	+0.9 I
21 H.	+0.1 I
1904 May 2 L.	+2.0 III
12 L.	+1.4 III
20 L.	+0.7 III
21 L.	+1.5 III
1907 May 11 L.	+0.5 IV
13 L.	+0.7 IV
Mean.....	+0.98
Corr.	-0.27

48 Virginis
 $12^h 58^m 45^s -3^{\circ} 7' 30''.38$

1903 May 9 H.	0.0 II
12 E.	-1.1 II
13 E.	-0.5 II
21 E.	-0.8 II
June 2 E.	-0.4 II
1904 May 4 L.	-0.4 III
7 L.	-0.3 III
1906 May 4 L.	-0.4 IV
8 L.	0.0 IV
1907 May 23 L.	-0.1 IV
June 3 L.	+0.7 IV
Mean.....	-0.30
Corr.	-0.44

14 Canum Venaticorum
 $13^h 1^m 4^s +36^{\circ} 20' 1''.95$

1899 June 8 H.	-0.1 I
1904 May 23 L.	+0.9 III
27 L.	-0.3 III
1906 May 12 L.	+0.2 IV
16 L.	+0.5 IV
Mean.....	+0.24
Corr.	+0.05

Groombridge 2006
 $13^h 4^m 30^s +88^{\circ} 11' "$

1903 May 11 E.	12.32 II
June 3 E.	12.03 II
4 E.	11.39 II
1905 Jan. 8 L.	10.49 III
16 L.	11.06 III
1907 May 14 L.	11.87 IV
20 L.	11.70 IV
June 8 L.	10.44 IV
Mean.....	+88 11 11.41
Corr.	+0.69

Groombridge 2006 S. P.
 $13^h 4^m 30^s +88^{\circ} 11' "$

1905 Jan. 1 L.	13.07 III
14 L.	12.56 III
Mean.....	+88 11 12.82
Corr.	-0.72

θ Virginis
 $13^h 4^m 46^s -5^{\circ} 0' 18''.68$

1899 June 23 H.	+0.4 I
1904 June 14 L.	+1.0 III
17 L.	+0.9 III
1907 Apr. 29 L.	+0.9 IV
May 9 L.	+1.3 IV
Mean.....	+0.90
Corr.	-0.46

17 Canum Venaticorum
 $13^h 5^m 28^s +39^{\circ} 1' 49''.26$

1904 June 3 L.	-1.1 III
4 L.	-0.2 III
1906 May 25 L.	-0.1 IV
June 2 L.	+0.7 IV
Mean.....	-0.18
Corr.	+0.09

43 Comæ Berenices
 $13^h 7^m 12^s +28^{\circ} 23' 10''.21$

1899 June 21 H.	-0.9 I
1904 May 20 L.	+0.3 III
21 L.	+0.2 III
1907 May 11 L.	0.0 IV
13 L.	+0.3 IV
Mean.....	-0.02
Corr.	-0.05

19 Canum Venaticorum
 $13^h 11^m 2^s +41^{\circ} 22' 59''.26$

1904 May 7 L.	+0.5 III
12 L.	+0.4 III
1905 May 22 L.	+0.7 III
1906 May 4 L.	-0.1 IV
8 L.	+0.4 IV
1907 June 5 L.	+0.4 IV
Mean.....	+0.38
Corr.	+0.12

γ Centauri
 $13^h 11^m 20^s -30^{\circ} 58' 37''.27$

1903 May 7 H.	+0.4 II
13 E.	0.0 II
21 E.	+0.6 II
1904 June 8 L.	+2.2 III
13 L.	+0.6 III
1906 May 12 L.	+0.7 IV
16 L.	+1.1 IV
Mean.....	+0.80
Corr.	-0.65

σ Virginis
 $13^h 12^m 33^s +5^{\circ} 59' 48''.64$

1903 May 17 H.	+0.5 II
19 E.	+0.5 II
June 2 E.	+1.0 II
1905 May 2 L.	+0.4 III
8 L.	+0.6 III
1906 May 18 L.	+0.7 IV
21 L.	+0.1 IV
24 L.	+0.6 IV
1907 June 8 L.	+0.7 IV
Mean.....	+0.57
Corr.	-0.34

20 Canum Venaticorum
 $13^h 13^m 4^s +41^{\circ} 5' 56''.89$

1905 May 12 L.	-0.2 III
20 L.	-0.4 III
1907 May 17 L.	-0.7 IV
23 L.	-0.5 IV
Mean.....	-0.45
Corr.	+0.12

61 Virginis
 $13^h 13^m 10^s -17^{\circ} 45' 22''.71$

1902 June 12 H.	+1.2 I
1903 May 28 E.	+0.7 II
1904 June 14 L.	+0.3 III
17 L.	+0.1 III
1906 June 4 L.	+1.0 IV
7 L.	+0.5 IV
Mean.....	+0.63
Corr.	-0.57

γ Hydrae
 $13^h 13^m 29^s -22^{\circ} 38' 38''.44$

1904 May 28 L.	+1.1 III
June 4 L.	+0.5 III
1907 May 20 L.	+1.2 IV
June 3 L.	+1.0 IV
15 L.	+0.2 IV
Mean.....	+0.80
Corr.	-0.60

23 Canum Venaticorum
 $13^h 15^m 50^s +40^{\circ} 40' 31''.38$

1904 May 23 L.	+0.2 III
27 L.	+0.3 III
1906 May 25 L.	+0.2 IV
June 2 L.	+0.7 IV
1907 June 17 L.	-0.6 IV
Mean.....	+0.16
Corr.	+0.11

ι Ursæ Minoris
 $13^h 18^m 39^s +85^{\circ} 16' "$

1903 June 3 E.	36.83 II
4 E.	38.07 II
1905 Jan. 16 L.	38.04 III
18 L.	37.26 III
Mean.....	+85 16 37.55
Corr.	+0.66

ι Ursæ Minoris S. P.
 $13^h 18^m 39^s +85^{\circ} 16' "$

1905 Jan. 1 L.	39.61 III
16 L.	39.08 III
Mean.....	+85 16 39.34
Corr.	-0.74

ζ^1 Ursæ Majoris
 $13^h 19^m 54^s +55^{\circ} 26' 51''.12$

1904 May 20 L.	-0.9 III
21 L.	-1.3 III
1907 May 9 L.	-0.5 IV
11 L.	0.0 IV
Mean.....	-0.68
Corr.	+0.32

α Virginis
 $13^h 19^m 55^s -10^{\circ} 38' 21''.72$

1899 June 21 H.	-1.0 I
30 H.	-0.8 I
1904 June 3 L.	+1.3 III
1907 May 17 L.	+0.7 IV
June 5 L.	+0.4 IV
Mean.....	+0.12
Corr.	-0.51

i Virginis
13^h 21^m 26^s -12° 11' 14".10

1903 May 9 H.	+1.0	II
21 E.	+0.6	II
June 9 H.	+1.0	II
1904 May 7 L.	+0.8	III
12 L.	+1.4	III
1906 May 8 L.	+0.5	IV
12 L.	+1.3	IV

Mean..... +0.94
Corr..... -0.52

70 Virginis
13^h 23^m 32^s +14° 18' 43".68

1903 May 7 H.	+0.4	II
13 E.	+0.5	II
17 H.	-0.7	II
1904 June 8 L.	+0.5	III
13 L.	+0.6	III
1906 May 16 L.	-0.2	IV
24 L.	-0.1	IV

Mean..... +0.14
Corr..... -0.24

9 B. Ursæ Minoris
13^h 23^m 35^s +72° 54' 38".39

1902 June 12 H.	+0.1	I
1905 Jan. 12 L.	0.0	III
16 L.	-0.8	III

Mean..... -0.23
Corr..... +0.53

9 B. Ursæ Minoris s. P.
13^h 23^m 35^s +72° 54' 38".38

1905 Jan. 16 L.	+0.6	III
18 L.	+1.4	III

Mean..... +1.00
Corr..... -0.82

69 H. Ursæ Majoris
13^h 24^m 47^s +60° 27' 43".98

1902 June 6 H.	-1.1	I
1904 June 17 L.	-0.8	III
18 L.	-0.4	III
1906 May 25 L.	-0.3	IV
June 4 L.	+0.2	IV

Mean..... -0.48
Corr..... +0.38

73 Virginis
13^h 26^m 39^s -18° 12' 48".20

1904 June 11 L.	+1.4	III
14 L.	+1.9	III
1906 June 7 L.	+0.8	IV
11 L.	+1.5	IV

Mean..... +1.40
Corr..... -0.57

350 G. Hydræ
13^h 27^m 2^s -28° 10' "

1903 June 3 E.	37.86	II
1904 May 27 L.	39.40	III
28 L.	38.43	III
1907 May 20 L.	38.08	IV
June 3 L.	38.53	IV

Mean..... -28 10 38.16
Corr..... -0.64

γ Virginis
13^h 29^m 36^s -0° 5' 4".44

1899 June 30 H.	+0.1	I
1902 May 17 H.	+0.5	I
1904 June 22 L.	+0.4	III
23 L.	+0.3	III
1907 May 17 L.	-0.1	IV
June 5 L.	+0.1	IV

Mean..... +0.22
Corr..... -0.41

81 Ursæ Majoris
13^h 30^m 17^s +55° 51' 39".30

1903 June 4 E.	-0.5	II
18 E.	-1.3	II
1905 May 21 L.	-0.9	III
June 1 L.	-1.5	III
1906 May 8 L.	-0.7	IV
12 L.	+0.2	IV
1907 June 17 L.	+0.4	IV

Mean..... -0.61
Corr..... +0.32

17 H. Canum Venaticorum
13^h 30^m 20^s +37° 41' 41".03

1904 May 21 L.	-0.7	III
23 L.	-1.1	III
1907 May 13 L.	-0.1	IV
14 L.	0.0	IV
June 20 L.	-0.4	IV

Mean..... -0.46
Corr..... +0.07

25 Canum Venaticorum
13^h 33^m 1^s +36° 48' 12".48

1904 May 12 L.	+0.3	III
20 L.	+0.5	III
1906 May 16 L.	+0.4	IV
24 L.	+0.3	IV

Mean..... +0.38
Corr..... +0.06

13 B. Ursæ Minoris
13^h 34^m 47^s +71° 45' 3".57

1902 June 12 H.	+0.4	I
1903 May 9 H.	-0.7	II
19 E.	-1.6	II
June 2 E.	-0.4	II
9 H.	-0.7	II
1905 Jan. 12 L.	-0.3	III
16 L.	-0.1	III
1907 June 8 L.	-0.8	IV
15 L.	0.0	IV

Mean..... -0.47
Corr..... +0.52

13 B. Ursæ Minoris s. P.
13^h 34^m 47^s +71° 45' 3".57

1905 Jan. 14 L.	+0.4	III
16 L.	+0.8	III

Mean..... +0.60
Corr..... -0.83

m Virginis
13^h 36^m 22^s -8° 11' 54".11

1904 June 3 L.	+1.7	III
4 L.	+1.1	III
11 L.	+0.8	III
1906 May 25 L.	+0.7	IV
June 2 L.	+0.6	IV

Mean..... +0.98
Corr..... -0.49

83 Virginis
13^h 39^m 6^s -15° 40' 34".17

1902 May 30 H.	+2.0	I
June 4 H.	+0.7	I
5 H.	+3.1	I
1903 Apr. 27 H.	+1.0	II
1904 June 8 L.	+1.1	III
13 L.	+0.8	III
1906 Jan. 29 L.	+1.1	III
June 4 L.	+1.4	IV
11 L.	+1.3	IV
1907 June 20 L.	+0.1	IV

Mean..... +1.26
Corr..... -0.55

i Centauri
13^h 40^m 0^s -32° 32' "

1903 May 7 H.	15.21	II
June 4 E.	15.15	II
8 E.	15.49	II
1905 May 12 L.	18.05	III
19 L.	17.47	III
1907 May 17 L.	15.86	IV
20 L.	17.24	IV
June 3 L.	16.07	IV
5 L.	16.73	IV

Mean..... -32 32 16.36
Corr..... -0.66

τ Boötis
13^h 42^m 31^s +17° 57' 18".42

1899 June 14 H.	+1.3	I
20 H.	-0.3	I
24 H.	+0.8	I
1904 May 27 L.	0.0	III
28 L.	+0.6	III
1906 June 7 L.	+0.2	IV
29 L.	+0.4	IV

Mean..... +0.43
Corr..... -0.19

η Ursæ Majoris
13^h 43^m 36^s +49° 48' 44".22

1899 June 2 H.	+0.7	I
21 H.	+0.3	I
29 H.	+0.9	I
30 H.	+0.6	I
1904 June 23 L.	-1.1	III
25 L.	+0.3	III
July 2 L.	+0.2	III
13 L.	-0.1	III
1907 June 6 L.	+0.8	IV
17 L.	0.1	IV

Mean..... +0.25
Corr..... +0.24

89 Virginis
13^h 44^m 26^s -17° 38' 9".91

1902 June 6 H.	+1.4	I
1904 May 20 L.	+0.5	III
23 L.	+0.2	III
1906 May 24 L.	+0.9	IV
25 L.	+0.5	IV

Mean..... +0.70
Corr..... -0.57

h Centauri
13^h 47^m 27^s -31° 26' "

1903 June 2 E.	0.29	II
18 E.	0.41	II
1904 June 14 L.	1.33	III
17 L.	0.18	III
1906 June 2 L.	0.93	IV
4 L.	0.40	IV
1907 June 15 L.	0.57	IV

Mean..... -31 26 0.60
Corr..... -0.65

7 Boötis
13^h 48^m 26^s +18° 25' "

1899 June 19 H.	32.60	I
1903 May 19 E.	31.92	II
1904 June 11 L.	32.01	III
13 L.	31.67	III
1906 June 11 L.	32.64	IV
25 L.	33.00	IV

Mean..... +18 25 32.31
Corr..... -0.19

i Draconis
13^h 48^m 31^s +05° 13' 1".97

1899 June 16 H.	-1.8	I
23 H.	-0.1	I
1902 June 12 H.	-0.3	I
1905 Jan. 8 L.	-0.2	III
12 L.	+0.3	III
1907 Jan. 22 L.	-0.7	IV
30 L.	-0.4	IV

Mean..... -0.46
Corr..... +0.44

i Draconis s. P.
13^h 48^m 31^s +05° 13' 1".96

1905 Jan. 1 L.	-0.6	III
14 L.	+0.8	III
1907 Jan. 26 L.	+1.1	IV
28 L.	+0.4	IV

Mean..... +0.42
Corr..... -0.86

η Boötis
13^h 49^m 55^s +18° 53' 55".08

1899 May 20 H.	-0.3	I
June 3 H.	-0.9	I
July 1 H.	-0.2	I
1902 May 17 H.	+0.6	I
1904 June 18 L.	-0.3	III
22 L.	-0.6	III
1907 June 21 L.	0.0	IV
24 L.	+0.1	IV

Mean..... 0.20
Corr..... 0.18

92 Virginis		
13 ^h 51 ^m 22 ^s	+1° 32' 23".15	
1899 June 24 H.	-0.7 I	
1903 Apr. 27 H.	-0.4 II	
1904 June 3 L.	+0.2 III	
4 L.	-0.6 III	
8 L.	-0.5 III	
1906 Jan. 29 L.	-0.9 III	
1907 June 5 L.	-0.2 IV	
8 L.	-0.3 IV	
Mean.....	-0.42	
Corr.	-0.39	

47 Hydræ		
13 ^h 52 ^m 54 ^s	-24° 20' "	
1903 June 8 E.	2.02 II	
1905 June 1 L.	1.27 III	
2 L.	1.66 III	
1906 May 24 L.	1.36 IV	
25 L.	2.16 IV	
1907 May 20 L.	2.26 IV	
June 3 L.	1.95 IV	
Mean.....	-24 29 1.81	
Corr.	-0.62	

48 Hydræ		
13 ^h 54 ^m 24 ^s	-24° 31' 20".16	
1903 June 3 E.	+1.0 II	
23 E.	+1.7 II	
1905 May 19 L.	+0.2 III	
24 L.	+0.5 III	
Mean.....	+0.85	
Corr.	-0.62	

7 Virginis		
13 ^h 56 ^m 33 ^s	+2° 1' 42".24	
1902 June 6 H.	+0.9 I	
1904 May 27 L.	+0.1 III	
28 L.	+0.8 III	
1906 June 2 L.	+0.2 IV	
4 L.	+0.7 IV	
7 L.	+0.3 IV	
Mean.....	+0.50	
Corr.	-0.38	

11 Boötis		
13 ^h 56 ^m 38 ^s	+27° 52' 10".28	
1898 June 7 H.	+0.8 I	
1902 May 30 H.	-0.1 I	
June 4 H.	[-1.8] I	
1904 May 20 L.	+0.4 III	
23 L.	0.0 III	
1907 June 6 L.	+0.1 IV	
17 L.	-0.6 IV	
20 L.	-0.6 IV	
Mean.....	-0.17	
Corr.	-0.06	

z Hydræ		
14 ^h 0 ^m 41 ^s	-20° 12' 3".27	
1904 June 13 L.	+1.8 III	
14 L.	+2.1 III	
25 L.	+2.5 III	
July 2 L.	+0.9 III	
1907 June 21 L.	+1.5 IV	
24 L.	+1.7 IV	
26 L.	+1.7 IV	
Mean.....	+1.74	
Corr.	-0.63	

94 Virginis		
14 ^h 1 ^m 0 ^s	-8° 24' 52".04	
1902 June 12 H.	+0.1 I	
1903 Apr. 27 H.	+2.7 II	
May 5 H.	+1.0 II	
June 2 E.	+1.0 II	
8 E.	+1.0 II	
1904 June 8 L.	+0.8 III	
11 L.	+0.4 III	
1906 Jan. 29 L.	+0.3 III	
June 11 L.	+1.2 IV	
25 L.	+1.2 IV	
Mean.....	+0.97	
Corr.	-0.49	

α Draconis		
14 ^h 1 ^m 41 ^s	+64° 51' 13".54	
1898 July 8 H.	0.0 I	
1899 June 20 H.	-1.3 I	
29 H.	-0.9 I	
30 H.	-0.6 I	
July 1 H.	-0.6 I	
2 H.	-1.1 I	
1904 June 17 L.	-0.7 III	
1905 Jan. 8 L.	-0.4 III	
12 L.	+0.4 III	
1907 Jan. 30 L.	+0.8 IV	
Mean.....	-0.44	
Corr.	+0.44	

α Draconis S. P.		
14 ^h 1 ^m 41 ^s	+64° 51' 13".58	
1905 Jan. 14 L.	+1.6 III	
20 L.	+0.7 III	
Mean.....	+1.15	
Corr.	-0.86	
9 H. Boötis		
14 ^h 3 ^m 56 ^s	+44° 19' 44".63	
1903 May 7 H.	+3.3 II	
June 3 E.	+2.4 II	
4 E.	+2.6 II	
18 E.	+2.1 II	
1904 June 3 L.	+3.2 III	
18 L.	+3.6 III	
1905 June 2 L.	+2.9 III	
1907 June 8 L.	+3.8 IV	
15 L.	+4.0 IV	
Mean.....	+3.10	
Corr.	+0.16	

d Boötis		
14 ^h 5 ^m 50 ^s	+25° 33' 54".65	
1899 June 21 H.	-0.3 I	
1904 June 22 L.	-1.2 III	
23 L.	-0.2 III	
1907 June 3 L.	+1.2 IV	
5 L.	-0.5 IV	
Mean.....	-0.20	
Corr.	-0.09	

κ Virginis		
14 ^h 7 ^m 34 ^s	-9° 48' 20".28	
1899 June 23 H.	-0.5 I	
1904 May 20 L.	+0.7 III	
23 L.	-0.4 III	
1906 May 24 L.	+1.1 IV	
25 L.	+0.8 IV	
Mean.....	+0.34	
Corr.	-0.50	

4 Ursæ Minoris		
14 ^h 9 ^m 14 ^s	+78° 1' 2".50	
1899 June 14 H.	-0.2 I	
1903 Apr. 29 H.	+0.6 II	
June 2 E.	-0.1 II	
8 E.	+0.3 II	
15 E.	-0.8 II	
23 E.	-0.3 II	
1905 Jan. 12 L.	+0.3 III	
16 L.	+0.2 III	
18 L.	+0.3 III	
Mean.....	+0.03	
Corr.	+0.59	

4 Ursæ Minoris S. P.		
14 ^h 9 ^m 14 ^s	+78° 1' 2".63	
1905 Jan. 14 L.	+0.7 III	
20 L.	+1.1 III	
Mean.....	+0.90	
Corr.	-0.79	

ε Virginis		
14 ^h 10 ^m 46 ^s	-5° 31' 26".17	
1902 May 17 H.	-0.5 I	
1904 May 27 L.	+0.2 III	
28 L.	+1.6 III	
1906 June 4 L.	+0.6 IV	
7 L.	+0.5 IV	
Mean.....	+0.48	
Corr.	-0.46	

α Boötis		
14 ^h 11 ^m 6 ^s	+19° 42' 6".39	
1898 July 7 H.	+1.6 I	
8 H.	+0.3 I	
1899 June 3 H.	+0.1 I	
30 H.	+1.0 I	
July 1 H.	-0.4 I	
2 H.	+0.2 I	
1904 June 25 L.	-0.4 III	
July 2 L.	+0.5 III	
13 L.	-0.1 III	
1907 June 20 L.	+0.7 IV	
21 L.	+1.0 IV	
Mean.....	+0.48	
Corr.	-0.17	

λ Boötis		
14 ^h 12 ^m 35 ^s	+46° 32' 51".41	
1899 June 24 H.	-0.1 I	
1904 June 14 L.	-0.2 III	
17 L.	-0.7 III	
1906 June 25 L.	-0.1 IV	
29 L.	0.0 IV	
Mean.....	-0.22	
Corr.	+0.19	

ζ Boötis		
14 ^h 12 ^m 38 ^s	+51° 40' 42".74	
1899 June 29 H.	+1.1 I	
1904 June 3 L.	-0.7 III	
8 L.	-0.6 III	
1906 Jan. 29 L.	+0.7 III	
1907 June 15 L.	-0.3 IV	
17 L.	0.0 IV	
Mean.....	+0.13	
Corr.	+0.27	

λ Virginis		
14 ^h 13 ^m 42 ^s	-12° 54' 38".91	
1899 June 21 H.	+0.8 I	
1904 June 11 L.	+0.9 III	
13 L.	+1.4 III	
1907 June 6 L.	+1.3 IV	
8 L.	+0.5 IV	
Mean.....	+0.96	
Corr.	-0.53	

2 Libræ		
14 ^h 18 ^m 3 ^s	-11° 15' 26".61	
1899 June 19 H.	+0.5 I	
1902 June 4 H.	+0.6 I	
5 H.	+1.4 I	
1903 Apr. 27 H.	-0.1 II	
June 14 H.	+0.4 II	
1905 May 19 L.	+0.6 III	
24 L.	+1.0 III	
1907 June 3 L.	+1.8 IV	
5 L.	+1.0 IV	
Mean.....	+0.80	
Corr.	-0.52	

3 G. Libræ		
14 ^h 19 ^m 6 ^s	-24° 21' "	
1902 June 12 H.	8.38 I	
1903 May 5 H.	7.32 II	
June 3 E.	7.64 II	
21 H.	7.66 II	
1904 May 20 L.	7.75 III	
23 L.	9.23 III	
1906 May 24 L.	7.39 IV	
25 L.	7.96 IV	
Mean.....	-24 21 7.92	
Corr.	-0.62	

Groombridge 2109		
14 ^h 21 ^m 24 ^s	+38° 50' "	
1898 June 7 H.	42.05 I	
10 H.	40.93 I	
1899 May 24 H.	39.83 I	
Mean.....	+38 50 40.94	
Corr.	+0.08	

θ Boötis		
14 ^h 21 ^m 48 ^s	+52° 18' 44".92	
1899 June 3 H.	+0.5 I	
14 H.	+0.1 I	
1904 June 18 L.	-0.6 III	
22 L.	+0.3 III	
1907 June 21 L.	-0.7 IV	
24 L.	-1.0 IV	
Mean.....	-0.23	
Corr.	+0.27	

f Boötis		
14 ^h 21 ^m 48 ^s	+19° 40' 35".19	
1899 June 16 H.	-0.3 I	
July 2 H.	-0.5 I	
1903 June 4 E.	+0.4 II	
1904 May 27 L.	-0.5 III	
28 L.	+0.3 III	
1906 June 4 L.	+0.6 IV	
7 L.	+0.8 IV	
11 L.	+0.8 IV	
Mean.....	+0.20	
Corr.	-0.17	

52 Hydræ			
14 ^h 22 ^m 19 ^s	-29° 2'	"	
1902 July 2 H.	31.50 I		
1903 June 15 E.	31.19 II		
23 E.	30.57 II		
1904 June 23 L.	30.16 III		
25 L.	30.46 III		
1906 June 25 L.	30.75 IV		
29 L.	30.62 IV		

Mean..... -29 2 30.75
Corr. -0.64

φ Virginis			
14 ^h 23 ^m 3 ^s	-1° 46' 46".95		
1899 June 30 H.	-1.4 I		
1904 June 14 L.	+0.1 III		
17 L.	+0.4 III		
1906 June 30 L.	0.0 IV		
July 5 L.	-0.3 IV		

Mean..... -0.40
Corr. -0.43

g Boötis			
14 ^h 25 ^m 9 ^s	+50° 17' 31".58		
1899 June 23 H.	+1.1 I		
1903 June 2 E.	+1.2 II		
8 E.	+1.5 II		
1904 June 11 L.	-0.4 III		
13 L.	+0.3 III		
1906 Jan. 29 L.	+0.4 III		
1907 June 17 L.	+0.2 IV		
20 L.	+0.1 IV		

Mean..... +0.55
Corr. +0.25

204 B. Boötis			
14 ^h 25 ^m 40 ^s	+42° 14' 49".82		
1899 June 24 H.	-2.1 I		
1904 June 3 L.	-1.5 III		
8 L.	-1.4 III		
1907 June 8 L.	-1.1 IV		
15 L.	-1.6 IV		
July 3 L.	-1.5 IV		

Mean..... -1.53
Corr. +0.14

ρ Boötis			
14 ^h 27 ^m 31 ^s	+30° 48' 37".71		
1904 July 2 L.	-1.2 III		
13 L.	-0.8 III		
1906 July 7 L.	+1.3 IV		
9 L.	-0.4 IV		
12 L.	+0.3 IV		

Mean..... -0.16
Corr. -0.02

5 Ursæ Minoris			
14 ^h 27 ^m 44 ^s	+76° 8' 26".27		
1899 June 19 H.	-0.9 I		
1903 June 18 E.	-1.1 II		
25 E.	-0.4 II		
1905 Jan. 12 L.	+0.2 III		
16 L.	0.0 III		

Mean..... -0.44
Corr. +0.57

5 Ursæ Minoris S. P.			
14 ^h 27 ^m 44 ^s	+76° 8' 26".31		
1903 Dec. 11 L.	+1.0 III		
1905 Jan. 14 L.	+0.6 III		
18 L.	+1.0 III		
1906 Jan. 10 L.	+0.3 III		
Mean.....	+0.72		
Corr.	-0.81		

14^h 28^m 3^s γ Boötis +38° 44' 44".98

1899 July 11 H.	+0.9 I		
1905 June 2 L.	-0.1 III		
3 L.	+0.9 III		
1907 June 6 L.	-0.7 IV		
July 1 L.	0.0 IV		
Mean.....	+0.20		
Corr.	+0.09		

14^h 29^m 0^s 56 B. Draconis +60° 39' 58".05

1902 June 6 H.	-0.1 I		
12 H.	-0.3 I		
1904 June 18 L.	-0.5 III		
22 L.	-0.7 III		
1906 May 24 L.	+0.4 IV		
25 L.	+0.7 IV		

Mean..... -0.08
Corr. +0.38

14^h 30^m 20^s σ Boötis +30° 10' 46".78

1899 June 16 H.	0.0 I		
1903 June 3 E.	0.0 II		
July 1 E.	-0.1 II		
1905 May 19 L.	-0.2 III		
22 L.	-0.2 III		
1907 June 3 L.	+0.2 IV		
5 L.	-0.4 IV		

Mean..... -0.10
Corr. -0.03

14^h 31^m 41^s 6 B. Libræ -11° 52' "

1903 May 5 H.	48.81 II		
21 H.	48.77 II		
June 21 H.	49.29 II		
1904 May 20 L.	46.96 III		
23 L.	46.37 III		
1905 June 8 L.	45.68 III		
1906 June 4 L.	45.67 IV		
1907 June 21 L.	45.61 IV		
27 L.	45.49 IV		

Mean..... -11 52 46.96
Corr. -0.52

14^h 35^m 7^s 33 Boötis +44° 50' 9".49

1899 May 24 H.	+0.1 I		
June 3 H.	+0.4 I		
1902 July 2 H.	+0.3 I		
1904 May 27 L.	+0.5 III		
June 3 L.	+0.2 III		
25 L.	+0.2 III		
July 2 L.	+0.7 III		
1906 June 25 L.	-0.5 IV		
29 L.	+0.6 IV		

Mean..... +0.28
Corr. +0.17

π Boötis			
14 ^h 36 ^m 2 ^s	+16° 50' 49".02		
1899 June 14 H.	-0.5 I		
24 H.	-0.5 I		
1902 May 17 H.	-0.9 I		
1904 June 8 L.	+0.4 III		
11 L.	+0.7 III		
1907 June 17 L.	+1.1 IV		
24 L.	+1.7 IV		

Mean..... +0.29
Corr. -0.21

14^h 36^m 22^s ζ Boötis +14° 9' 25".83

1899 June 30 H.	+0.9 I		
July 2 H.	+0.3 I		
1902 July 11 H.	+0.5 I		
1904 June 13 L.	+1.6 III		
14 L.	+0.7 III		
1906 July 9 L.	+0.6 IV		
12 L.	+0.6 IV		

Mean..... +0.74
Corr. -0.24

14^h 37^m 32^s c¹ Centauri -34° 44' "

1903 May 28 H.	34.48 II		
June 15 E.	34.32 II		
1904 June 17 L.	34.31 III		
23 L.	34.08 III		
1906 Jan. 29 L.	36.40 III		
1907 June 8 L.	36.54 IV		
15 L.	36.22 IV		

Mean..... -34 44 35.19
Corr. -0.67

14^h 37^m 47^s μ Virginis -5° 13' 26".29

1902 July 12 H.	-0.1 I		
1905 May 24 L.	+0.4 III		
June 1 L.	+0.8 III		
1906 July 5 L.	+0.8 IV		
7 L.	+1.4 IV		

Mean..... +0.66
Corr. -0.46

14^h 39^m 2^s 34 Boötis +26° 57' 10".17

1899 June 16 H.	-0.4 I		
1903 June 2 E.	-0.5 II		
8 E.	-0.3 II		
July 2 H.	+0.7 II		
1905 May 19 L.	+0.5 III		
22 L.	+0.4 III		
1907 June 3 L.	+0.9 IV		
6 L.	+0.5 IV		

Mean..... +0.22
Corr. -0.07

14^h 40^m 30^s Piazzii 166 -20° 45' "

1903 June 3 E.	6.25 II		
18 E.	6.44 II		
July 1 E.	5.94 II		
1904 June 18 L.	5.30 III		
22 L.	6.56 III		
1906 June 11 L.	6.67 IV		
July 2 L.	6.17 IV		

Mean..... -20 45 6.10
Corr. -0.59

ε Boötis			
14 ^h 40 ^m 37 ^s	+27° 29' 44".55		
1898 July 7 H.	+0.2 I		
8 H.	+1.5 I		
1899 July 1 H.	+1.0 I		
11 H.	+0.6 I		
1905 June 15 L.	+1.4 III		
17 L.	+1.1 III		
1907 July 6 L.	+1.4 IV		
8 L.	+0.9 IV		

Mean..... +1.01
Corr. -0.07

14^h 41^m 12^s 109 Virginis +2° 18' 51".11

1899 June 23 H.	-0.6 I		
1902 July 14 H.	+0.3 I		
1905 June 2 L.	+0.8 III		
9 L.	+0.9 III		
1906 June 4 L.	+0.7 IV		
7 L.	+0.8 IV		

Mean..... +0.48
Corr. -0.38

14^h 43^m 50^s μ Libræ -13° 43' 56".75

1902 June 12 H.	+0.4 I		
1903 May 5 H.	+1.4 II		
June 21 H.	+1.0 II		
23 E.	+1.4 II		
1905 June 3 L.	+1.1 III		
8 L.	+1.3 III		
1907 June 21 L.	+0.4 IV		
July 1 L.	-0.3 IV		

Mean..... +0.84
Corr. -0.54

14^h 45^m 9^s 8 Libræ -15° 34' 53".58

1904 May 27 L.	+0.8 III		
June 3 L.	+1.1 III		
1906 June 25 L.	+0.7 IV		
29 L.	+0.6 IV		

Mean..... +0.80
Corr. -0.55

14^h 45^m 11^s 295 B. Boötis +38° 13' 24".63

1899 June 14 H.	-0.8 I		
1905 June 13 L.	-0.4 III		
25 L.	-0.5 III		
1907 June 20 L.	-2.0 IV		
27 L.	-1.4 IV		
July 3 L.	-0.9 IV		

Mean..... -1.00
Corr. +0.08

14^h 45^m 21^s α Libræ -15° 37' 34".92

1902 July 13 H.	+1.7 I		
1904 July 13 L.	+0.6 III		
1905 June 14 L.	+1.0 III		
1906 July 13 L.	+0.5 IV		
1907 June 5 L.	+0.7 IV		
24 L.	+0.4 IV		

Mean..... +0.82
Corr. -0.55

ξ Boötis $14^h 46^m 47^s +19^\circ 30' 50''.57$			ξ² Libræ $14^h 51^m 20^s -11^\circ 0' 22''.08$			β Boötis $14^h 58^m 11^s +40^\circ 47' 5''.55$			ι Lupi $15^h 8^m 30^s -31^\circ 8' "$		
1899 June 20 H.	+1.7	I	1903 June 8 E.	+0.3	II	1898 July 23 H.	-0.9	I	1903 May 5 H.	44.18	II
1903 Apr. 29 H.	+1.0	II	18 E.	+1.3	II	1899 July 19 H.	-1.0	I	June 18 E.	43.95	II
May 21 H.	+1.0	II	July 6 H.	+0.1	II	1905 June 15 L.	+0.4	III	21 H.	43.49	II
1905 May 24 L.	+1.2	III	1904 June 8 L.	+1.1	III	17 L.	-0.1	III	July 7 H.	42.76	II
June 1 L.	+1.3	III	11 L.	+0.4	III	1906 June 25 L.	-0.5	IV	8 H.	43.83	II
1906 Jan. 29 L.	+1.0	III	1907 June 20 L.	+0.9	IV	29 L.	[+2.2]	IV	1904 June 14 L.	44.84	III
July 9 L.	+0.7	IV	27 L.	+1.1	IV	Mean.....	-0.42		17 L.	44.16	III
12 L.	+1.4	IV	July 6 L.	+1.6	IV	Corr.	+0.12		1905 June 25 L.	43.12	III
Mean.....	+1.16		Mean.....	+0.85					1906 June 4 L.	44.71	IV
Corr.	-0.17		Corr.	-0.51					July 9 L.	43.82	IV
61 B. Draconis $14^h 48^m 54^s +59^\circ 42' 1''.82$			321 B. Boötis $14^h 51^m 30^s +14^\circ 51' 1''.28$			γ Scorpæ $14^h 58^m 13^s -24^\circ 53' 20''.31$			57 B. Ursæ Minoris $15^h 9^m 21^s +87^\circ 37' 4''.13$		
1899 June 16 H.	-1.5	I	1904 June 13 L.	+0.4	III	1902 May 17 H.	+0.3	I	1899 June 22 H.	-0.1	I
1902 July 11 H.	-0.5	I	14 L.	+0.2	III	1905 June 5 L.	+1.2	III	July 2 H.	-0.7	I
1904 June 25 L.	-1.0	III	1907 June 17 L.	+0.2	IV	9 L.	+0.8	III	1903 May 28 H.	-2.1	II
July 2 L.	-1.0	III	21 L.	+0.1	IV	14 L.	+1.9	III	June 23 E.	-1.6	II
1906 June 30 L.	-0.4	IV	July 8 L.	-0.6	IV	1906 July 9 L.	+1.0	IV	July 1 E.	-2.2	II
July 7 L.	-1.1	IV	Mean.....	+0.06		12 L.	+1.1	IV	1905 Feb. 6 L.	-1.5	III
Mean.....	-0.92		Corr.	-0.23		Mean.....	+1.05		15 L.	-1.4	III
Corr.	+0.37					Corr.	-0.62		Mean.....	-1.37	
ξ¹ Libræ $14^h 48^m 57^s -11^\circ 29' 25''.23$			43 B. Libræ $14^h 51^m 37^s -20^\circ 58' 2''.04$			φ Boötis $15^h 0^m 10^s +27^\circ 20' 14''.80$			57 B. Ursæ Minoris s. p. $15^h 9^m 21^s +87^\circ 37' 4''.20$		
1899 June 21 H.	-0.4	I	1903 June 23 E.	+1.3	II	1904 June 22 L.	-0.4	III	1905 Feb. 7 L.	+0.8	III
1902 July 2 H.	+1.5	I	1904 June 17 L.	+1.9	III	23 L.	+0.5	III	10 L.	+1.5	III
1903 Apr. 27 H.	+1.2	II	18 L.	+2.8	III	1907 June 15 L.	+0.1	IV	Mean.....	+1.15	
1905 May 19 L.	+0.1	III	1906 July 2 L.	+2.5	IV	17 L.	+0.3	IV	Corr.	-0.73	
22 L.	+0.3	III	5 L.	+1.7	IV	Mean.....	+0.12				
1907 June 8 L.	+0.6	IV	Mean.....	+2.04		Corr.	-0.07				
15 L.	+0.1	IV	Corr.	-0.59							
Mean.....	+0.49		Piazzæ 235 $14^h 53^m 4^s +50^\circ 2' "$			ι Boötis (north fol.) $15^h 0^m 30^s +48^\circ 2' 37''.94$			3 Serpentis $15^h 10^m 13^s +5^\circ 18' 37''.98$		
Corr.	-0.52		1898 June 7 H.	15.30	I	1899 July 11 H.	-0.3	I	1899 June 14 H.	0.0	I
381 G. Centauri $14^h 49^m 36^s -33^\circ 26' "$			10 H.	16.20	I	1903 June 15 E.	-1.3	II	1902 June 5 H.	-0.1	I
1903 May 28 H.	59.55	II	1899 May 24 H.	15.53	I	18 E.	-1.7	II	6 H.	+0.3	I
June 2 E.	58.38	II	Mean.....	+50.2	15.68	1904 June 25 L.	-0.5	III	1904 June 22 L.	0.0	III
15 E.	57.32	II	Corr.	+0.24		July 2 L.	-0.8	III	23 L.	+0.7	III
1904 June 22 L.	58.78	III	δ Libræ $14^h 53^m 38^s -8^\circ 7' 19''.88$			11 L.	-1.0	III	1906 July 7 L.	+0.4	IV
23 L.	57.58	III	1899 June 14 H.	-0.2	I	13 L.	-1.3	III	12 L.	+0.4	IV
1907 June 3 L.	57.77	IV	1903 May 5 H.	[+2.4]	II	1907 June 24 L.	-0.6	IV	Mean.....	+0.24	
6 L.	57.38	IV	June 21 H.	+1.4	II	July 1 L.	-1.5	IV	Corr.	-0.35	
Mean.....	-33.26	58.11	30 E.	-0.3	II	3 L.	-0.8	IV			
Corr.	-0.66		July 1 E.	-0.4	II	Mean.....	-0.98				
β Ursæ Minoris $14^h 51^m 0^s +74^\circ 33' 51''.06$			1904 May 27 L.	0.0	III	Corr.	+0.22				
1899 July 1 H.	+0.2	I	June 3 L.	+0.3	III						
11 H.	-0.4	I	1906 Feb. 14 L.	+1.6	IV	c Boötis $15^h 2^m 55^s +25^\circ 15' 30''.01$			δ Boötis $15^h 11^m 28^s +33^\circ 41' 15''.41$		
1905 Jan. 16 L.	+0.1	III	June 4 L.	+0.2	IV	1899 July 1 H.	-0.4	I	1899 June 30 H.	-0.3	I
18 L.	-0.3	III	Mean.....	+0.32		1902 July 2 H.	+0.7	I	1904 July 11 L.	+0.3	III
1907 Jan. 22 L.	+0.2	IV	Corr.	-0.49		1903 Apr. 27 H.	+0.8	II	13 L.	-0.2	III
30 L.	+0.6	IV	2 H. Ursæ Minoris $14^h 56^m 0^s +66^\circ 19' 50''.17$			20 H.	-0.3	II	1906 June 25 L.	0.0	IV
Mean.....	+0.07		1902 June 6 H.	-0.4	I	May 21 H.	+0.6	II	29 L.	+0.4	IV
Corr.	+0.55		12 H.	-0.1	I	June 8 E.	-0.6	II	Mean.....	+0.04	
β Ursæ Minoris s. p. $14^h 51^m 0^s +74^\circ 33' 51''.07$			1905 Jan. 22 L.	+0.9	III	July 2 H.	+1.4	II	Corr.	+0.02	
1905 Jan. 18 L.	+1.2	III	Feb. 6 L.	+0.3	III	1904 June 11 L.	-0.4	III			
20 L.	+1.5	III	Mean.....	+0.18		13 L.	+0.7	III			
1907 Jan. 23 L.	+1.3	IV	Corr.	+0.45		1907 June 20 L.	0.0	IV			
Feb. 6 L.	-0.8	IV	2 H. Ursæ Minoris s. p. $14^h 56^m 0^s +66^\circ 19' 50''.20$			21 L.	-0.2	IV			
Mean.....	+1.20		1905 Jan. 27 L.	+0.5	III	Mean.....	+0.21				
Corr.	-0.81		Feb. 7 L.	-0.9	III	Corr.	-0.10				
			Mean.....	-0.20		ε Libræ $15^h 6^m 31^s -19^\circ 24' 48''.45$			β Libræ $15^h 11^m 37^s -9^\circ 0' 50''.50$		
			Corr.	-0.85		1902 July 14 H.	+0.9	I	1899 July 18 H.	+1.3	I
						1904 June 3 L.	+0.3	III	1905 Apr. 30 L.	+1.0	III
						8 L.	+0.2	III	June 9 L.	+1.6	III
						1906 June 30 L.	+1.2	IV	1907 June 15 L.	+1.5	IV
						July 2 L.	+1.3	IV	17 L.	+1.3	IV
						5 L.	+1.4	IV	Mean.....	+1.34	
						Mean.....	+0.88		Corr.	-0.50	
						Corr.	-0.58				

γ^1 H. Ursæ Minoris
15^h 13^m 29^s +67° 43' 33''.87

1899 July 1 H. -1.0 I
1902 June 12 H. -0.2 II
1905 Jan. 22 L. -0.8 III
28 L. -1.1 III

Mean..... -0.78
Corr. +0.47

γ^1 H. Ursæ Minoris s. p.
15^h 13^m 29^s +67° 43' 33''.04

1905 Jan. 27 L. +0.9 III
30 L. +1.7 III

Mean..... +1.30
Corr. -0.85

α^2 Libræ
15^h 17^m 27^s -14° 46' 37''.76

1902 July 2 H. +2.6 I
11 H. +1.3 I
13 H. +1.9 I
1903 Apr. 27 H. +0.3 II
May 21 H. +0.7 II
July 6 H. +1.2 II
1904 June 11 L. +1.0 III
13 L. +1.3 III
1906 June 30 L. +0.5 IV
July 5 L. +0.4 IV

Mean..... +1.12
Corr. -0.55

η Coronæ Borealis
15^h 19^m 4^s +30° 38' 54''.86

1899 July 11 H. +0.8 I
1902 June 6 H. 0.0 I
1903 June 8 E. +0.5 II
15 E. 0.0 II
July 2 H. +2.1 II
1904 June 14 L. 0.0 III
17 L. +0.3 III
1906 June 4 L. +0.8 IV
11 L. 0.0 IV

Mean..... +0.50
Corr. -0.02

μ Boötis
15^h 20^m 43^s +37° 43' 40''.31

1899 June 22 H. +0.1 I
July 19 H. -1.2 I
1904 June 25 L. -0.7 III
July 2 L. -0.5 III
1907 June 24 L. -1.3 IV
27 L. -0.6 IV

Mean..... -0.70
Corr. +0.07

γ^2 Ursæ Minoris
15^h 20^m 53^s +72° 11' 23''.40

1905 Feb. 5 L. -0.3 III
15 L. +1.1 III
1906 Feb. 14 L. -0.5 IV
22 L. -0.7 IV

Mean..... -0.10
Corr. +0.52

γ^2 Ursæ Minoris s. p.
15^h 20^m 53^s +72° 11' 23''.40

1905 Feb. 7 L. -0.3 III
10 L. +1.0 III
1906 Feb. 13 L. +0.6 IV
17 L. +1.0 IV

Mean..... +0.58
Corr. -0.83

τ^1 Serpentis
15^h 21^m 9^s +15° 46' 46''.32

1904 June 3 L. +0.5 III
8 L. +0.2 III
1906 July 12 L. +0.9 IV
13 L. +0.3 IV

Mean..... +0.48
Corr. -0.22

β^2 Libræ
15^h 22^m 37^s -16° 22' 4''.64

1903 Apr. 18 H. -0.6 II
29 H. +0.5 II
May 5 H. +1.3 II
28 H. +1.8 II
June 18 E. +2.3 II
July 1 E. +1.5 II
1904 June 22 L. +1.1 III
23 L. +1.7 III
1907 June 15 L. +1.3 IV
20 L. +1.2 IV

Mean..... +1.21
Corr. -0.56

ϵ Draconis
15^h 22^m 42^s +59° 18' 58''.61

1905 June 25 L. -0.2 III
26 L. -0.7 III
1907 June 17 L. -1.7 IV
21 L. -0.8 IV

Mean..... -0.85
Corr. +0.37

β Coronæ Borealis
15^h 23^m 42^s +29° 27' 1''.67

1905 June 15 L. -0.2 III
17 L. 0.0 III
1907 July 3 L. +0.2 IV
8 L. +0.6 IV

Mean..... +0.15
Corr. -0.04

ν^1 Boötis
15^h 27^m 20^s +41° 10' 25''.75

1899 July 1 H. +0.3 I
1902 July 14 H. 0.0 I
1904 July 11 L. -0.1 III
13 L. +0.2 III
1906 June 25 L. -0.1 IV
29 L. +0.6 IV

Mean..... +0.15
Corr. +0.12

ν^2 Boötis
15^h 28^m 12^s +41° 14' 19''.19

1899 July 11 H. -0.4 I
1905 Apr. 20 L. -0.8 III
24 L. -0.8 III
30 L. -0.3 III
1906 June 30 L. -0.5 IV
July 5 L. -1.0 IV

Mean..... -0.63
Corr. +0.12

θ Coronæ Borealis
15^h 28^m 54^s +31° 41' 47''.51

1899 June 14 H. -1.4 I
1905 June 14 L. 0.0 III
21 L. -0.3 III
1906 July 7 L. 0.0 IV
9 L. -0.5 IV

Mean..... -0.44
Corr. -0.01

γ Libræ
15^h 29^m 56^s -14° 27' 21''.41

1902 July 11 H. +0.5 I
12 H. +1.5 I
13 H. +1.1 I
1904 July 2 L. +0.4 III
1905 May 7 L. +0.4 III
1907 June 24 L. -0.6 IV
July 6 L. +0.1 IV

Mean..... +0.49
Corr. -0.54

α Coronæ Borealis
15^h 30^m 27^s +27° 3' 3''.78

1898 July 15 H. +1.6 I
23 H. +1.7 I
29 H. +0.1 I
Aug. 1 H. +1.6 I
1899 July 27 H. +0.2 I
1905 June 9 L. +0.6 III
15 L. +0.2 III
1907 July 8 L. -0.1 IV
9 L. +0.9 IV

Mean..... +0.76
Corr. -0.07

β H. Scorpil
15^h 30^m 57^s -27° 48' "

1902 June 2 H. 13.61 I
1903 Apr. 27 H. 14.37 II
May 21 H. 13.25 II
1904 June 14 L. 13.25 III
25 L. 12.37 III
1907 June 27 L. 13.20 IV
July 3 L. 13.59 IV

Mean..... -27 48 13.38
Corr. -0.64

B. D. +43° 25' 10"
15^h 31^m 44^s +43° 29' "

1902 June 4 H. 54.68 I
6 H. 54.17 I
1904 June 11 L. 55.05 III
17 L. 54.76 III
1906 June 4 L. 55.88 IV
11 L. 55.70 IV

Mean..... +43 29 55.04
Corr. +0.15

ϕ Boötis
15^h 34^m 14^s +40° 40' 44''.26

1904 June 3 L. +0.3 III
13 L. +0.1 III
1906 July 12 L. +0.4 IV
13 L. 0.0 IV
18 L. -0.2 IV

Mean..... +0.12
Corr. +0.11

θ Ursæ Minoris
15^h 34^m 23^s +77° 40' "

1899 June 30 H. 56.64 I
1902 July 26 H. 56.14 I
1903 Apr. 29 H. 56.31 II
June 21 H. 56.94 II
July 6 H. 56.29 II
1905 Jan. 28 L. 56.68 III
Feb. 6 L. 57.10 III
1906 Feb. 14 L. 57.17 IV
22 L. 56.92 IV

Mean..... +77 40 56.69
Corr. +0.58

θ Ursæ Minoris s. p.
15^h 34^m 23^s +77° 40' "

1905 Jan. 27 L. 57.13 III
Feb. 7 L. 57.88 III
1906 Feb. 13 L. 57.95 IV
17 L. 58.09 IV

Mean..... +77 40 57.76
Corr. -0.80

ζ Coronæ Borealis
15^h 35^m 37^s +36° 57' 37''.27

1899 July 20 H. -0.8 I
1904 June 22 L. -0.7 III
23 L. +0.4 III
1907 June 20 L. -0.1 IV
21 L. -0.4 IV

Mean..... -0.32
Corr. +0.06

κ Libræ
15^h 36^m 11^s -19° 21' 16''.70

1903 Apr. 18 H. +1.5 II
May 5 H. +0.6 II
July 1 E. +0.4 II
1905 Apr. 24 L. -0.1 III
30 L. -0.3 III
1907 June 15 L. -0.1 IV
17 L. 0.0 IV

Mean..... +0.29
Corr. -0.58

ϵ Serpentis
15^h 37^m 6^s +19° 59' 31''.92

1899 June 14 H. +0.6 I
1903 June 30 E. +0.2 II
July 19 H. +1.3 II
1904 July 11 L. +0.4 III
13 L. +0.9 III
1906 July 5 L. +0.6 IV
7 L. +0.6 IV

Mean..... +0.66
Corr. -0.17

γ Coronæ Borealis15^h 38^m 38^s +26° 36' 44".27

1899 July 11 H.	+1.9	I
1905 Apr. 20 L.	+0.8	III
June 5 L.	+1.5	III
25 L.	+1.2	III
1907 July 11 L.	+1.5	IV
12 L.	+0.2	IV

Mean..... +1.18
 Corr. -0.08

 α Serpentis15^h 30^m 21^s +0° 44' 24".63

1898 July 15 H.	+1.2	I
23 H.	+0.5	I
28 H.	+1.8	I
29 H.	+0.9	I
1904 Aug. 6 L.	0.0	III
1905 May 7 L.	0.0	III
1907 July 6 L.	+0.3	IV
9 L.	+1.0	IV

Mean..... +0.71
 Corr. -0.33

 β Serpentis15^h 41^m 34^s +15° 44' 4".49

1899 July 18 H.	+0.7	I
1902 July 5 H.	+1.7	I
11 H.	+1.4	I
12 H.	+1.0	I
13 H.	+1.5	I
1904 June 25 L.	-0.2	III
July 2 L.	-0.8	III
1906 June 29 L.	-0.2	IV
30 L.	+0.2	IV

Mean..... +0.59
 Corr. -0.22

 κ Serpentis15^h 44^m 14^s +18° 27' 0".30

1904 June 3 L.	+1.3	III
1906 June 11 L.	+0.6	IV
25 L.	-0.1	IV

Mean..... +0.60
 Corr. -0.19

 μ Serpentis15^h 44^m 24^s -3° 7' 27".49

1899 July 19 H.	-0.2	I
1902 June 1 H.	+0.9	I
5 H.	+1.0	I
1904 June 22 L.	-0.5	III
23 L.	+0.1	III
1906 July 19 L.	+1.3	IV
25 L.	+0.5	IV

Mean..... +0.44
 Corr. -0.44

 χ Lupi15^h 44^m 36^s -33° 19' "

1903 May 21 H.	21.63	II
June 15 E.	21.07	II
21 H.	21.79	II
July 7 H.	20.17	II
1904 June 11 L.	21.59	III
17 L.	20.24	III
1906 July 9 L.	20.61	IV
12 L.	21.07	IV

Mean..... -33 19 21.02
 Corr. -0.66

 η H. Draconis15^h 45^m 8^s +62° 54' 30".53

1899 June 22 H.	-1.1	I
1904 June 13 L.	-0.4	III
14 L.	-0.4	III
1906 July 13 L.	-0.3	IV
18 L.	-0.4	IV

Mean..... -0.52
 Corr. +0.41

 ϵ Serpentis15^h 45^m 50^s +4° 46' 43".82

1898 July 18 H.	[+2.3]	I
30 H.	+0.6	I
1905 June 17 L.	+0.1	III
21 L.	-0.5	III
1907 June 24 L.	-0.3	IV
27 L.	-0.3	IV
July 3 L.	-0.5	IV

Mean..... -0.15
 Corr. -0.35

 λ Libræ15^h 47^m 32^s -19° 52' 5".88

1902 June 4 H.	+3.2	I
11 H.	+1.3	I
1905 Apr. 20 L.	+1.5	III
24 L.	+1.8	III
1907 June 20 L.	+0.8	IV
21 L.	+1.9	IV

Mean..... +1.75
 Corr. -0.59

 ζ Ursæ Minoris15^h 47^m 37^s +78° 6' 7".88

1899 June 14 H.	+0.8	I
1905 Feb. 17 L.	-0.6	III
23 L.	-0.4	III
1906 Feb. 14 L.	0.0	IV
22 L.	-1.0	IV

Mean..... -0.24
 Corr. +0.59

 ζ Ursæ Minoris s. P.15^h 47^m 37^s +78° 6' 7".88

1905 Feb. 18 L.	+2.2	III
24 L.	+0.9	III
1906 Feb. 13 L.	+1.5	IV
17 L.	+1.4	IV

Mean..... +1.50
 Corr. -0.79

 χ Herculis15^h 49^m 13^s +42° 43' 55".81

1899 June 30 H.	-1.4	I
1905 Apr. 30 L.	-0.3	III
June 15 L.	+0.5	III
1907 July 11 L.	-0.9	IV
12 L.	-0.7	IV

Mean..... -0.56
 Corr. +0.14

 ρ Scorpïi15^h 50^m 43^s -28° 55' "

1902 May 29 H.	17.74	I
30 H.	18.71	I
1903 Apr. 29 H.	16.40	II
May 5 H.	19.19	II
July 1 E.	19.03	II
19 H.	18.19	II
1904 July 11 L.	18.54	III
13 L.	17.20	III
1906 July 5 L.	18.80	IV
7 L.	18.40	IV

Mean..... -28 55 18.22
 Corr. -0.64

 γ Serpentis15^h 51^m 50^s +15° 50' 10".40

1899 July 18 H.	+0.9	I
1905 June 25 L.	+1.0	III
26 L.	+0.4	III
1906 June 29 L.	+0.6	IV
30 L.	+0.6	IV

Mean..... +0.70
 Corr. -0.22

 π Scorpïi15^h 52^m 48^s -25° 40' 34".57

1902 July 2 H.	+0.3	I
5 H.	+0.9	I
13 H.	+1.6	I
1903 May 28 H.	+0.8	II
June 30 E.	+0.2	II
1905 June 5 L.	+1.6	III
14 L.	+0.8	III
1907 June 17 L.	+0.9	IV
July 6 L.	+1.1	IV

Mean..... +0.91
 Corr. -0.62

 ϵ Coronæ Borealis15^h 53^m 27^s +27° 10' 2".21

1898 July 23 H.	+0.4	I
28 H.	+0.6	I
29 H.	+0.6	I
Aug. 3 H.	-0.2	I
1904 June 17 L.	+0.6	III
July 2 L.	+0.1	III
1907 July 8 L.	+0.8	IV
9 L.	+1.5	IV

Mean..... +0.55
 Corr. -0.07

 δ Scorpïi15^h 54^m 25^s -22° 20' 13".91

1904 Aug. 6 L.	+1.6	III
1905 May 7 L.	+0.4	III
1906 July 19 L.	+1.8	IV
25 L.	+1.7	IV

Mean..... +1.38
 Corr. -0.60

 μ Libræ15^h 54^m 43^s -16° 14' 21".08

1903 Apr. 18 H.	0.0	II
June 21 H.	+0.3	II
July 2 H.	+1.4	II
6 H.	+0.7	II
1904 June 3 L.	+0.4	III
8 L.	+0.2	III
22 L.	+0.6	III
1906 June 11 L.	+0.2	IV
25 L.	+0.8	IV

Mean..... +0.51
 Corr. -0.56

66 H¹. Draconis15^h 55^m 25^s +55° 1' 56".69

1899 July 31 H.	-1.4	I
1904 June 13 L.	-0.1	III
14 L.	-0.3	III
1906 July 13 L.	-0.8	IV
18 L.	-1.0	IV

Mean..... -0.72
 Corr. +0.31

 τ Herculis15^h 56^m 45^s +18° 5' 41".08

1899 June 22 H.	+0.7	I
1902 June 1 H.	+1.0	I
2 H.	+2.0	I
5 H.	+0.1	I
1903 May 21 H.	+1.4	II
1904 June 23 L.	-0.1	III
25 L.	-0.3	III
1906 July 9 L.	0.0	IV
12 L.	+0.1	IV

Mean..... +0.54
 Corr. -0.19

 θ^1 Scorpïi15^h 56^m 37^s -19° 31' 54".42

1898 July 30 H.	+0.7	I
1905 Apr. 24 L.	+0.8	III
30 L.	+0.9	III
1907 July 11 L.	+2.2	IV
12 L.	+0.8	IV

Mean..... +1.08
 Corr. -0.58

 θ Draconis16^h 0^m 1^s +58° 40' 58".39

1905 June 15 L.	-0.8	III
17 L.	-0.4	III
1907 June 20 L.	-0.5	IV
July 3 L.	-1.1	IV

Mean..... -0.70
 Corr. +0.36

 ω^2 Scorpïi16^h 1^m 32^s -20° 35' "

1902 June 11 H.	53.95	I
1903 Apr. 29 H.	53.45	II
July 1 E.	54.30	II
7 H.	52.56	II
19 H.	54.18	II
1904 July 13 L.	54.31	III
1905 Apr. 20 L.	55.30	III
June 21 L.	54.80	III
1907 June 21 L.	54.42	IV
27 L.	54.49	IV

Mean..... -20 35 54.18
 Corr. -0.59

κ Herculis $16^h 3^m 34^s +17^\circ 18' 47''.02$ 1903 May 5 H. +0.9 II June 30 E. +1.7 II July 8 H. +1.0 II 1904 July 2 L. +1.1 III 11 L. +1.1 III 1905 June 25 L. +1.4 III 1906 June 29 L. +1.1 IV 30 L. +1.2 IV Mean..... +1.19 Corr. -0.20		ν Scorpii $16^h 6^m 11^s -19^\circ 12' 3''.67$ 1902 May 30 H. +1.3 I 1903 Apr. 18 H. +0.5 II 1904 June 23 L. +1.5 III 25 L. +2.1 III 1906 July 9 L. +2.2 IV 12 L. +1.9 IV Mean..... +1.58 Corr. -0.58		σ Scorpii $16^h 15^m 7^s -25^\circ 21' 10''.44$ 1902 June 1 H. +0.8 I 2 H. +0.7 I 5 H. +1.1 I Aug. 12 H. +0.9 I 1903 Apr. 29 H. +2.7 II July 7 H. +1.1 II 1905 June 15 L. +0.7 III 17 L. +0.6 III 1907 June 27 L. +1.0 IV July 3 L. +0.3 IV Mean..... +0.99 Corr. -0.62		ρ Ophiuchi (mean)* $16^h 19^m 35^s -23^\circ 12' 58''.81$ 1905 June 5 L. -0.1 III 14 L. -0.3 III 1906 June 11 L. +0.6 IV 25 L. +0.4 IV Mean..... +0.15 Corr. -0.61 ρ Ophiuchi (south star)* $16^h 19^m 35^s -23^\circ 12' 58''.80$ 1902 May 29 H. -1.8 I 30 H. -1.9 I 1903 Apr. 18 H. -1.9 II May 12 H. -1.4 II June 21 H. -1.6 II 1905 Apr. 20 L. -1.2 III May 7 L. -1.9 III Mean..... -1.67 Corr. -0.61	
τ Coronæ Borealis $16^h 5^m 19^s +36^\circ 44' 43''.44$ 1904 June 13 L. +0.2 III 14 L. +0.1 III 1906 July 5 L. -0.4 IV 7 L. -0.4 IV Mean..... -0.12 Corr. +0.06		δ Ophiuchi $16^h 9^m 6^s -3^\circ 26' 13''.22$ 1898 July 23 H. +0.1 I 29 H. -0.2 I Aug. 3 H. +1.3 I 1904 Aug. 6 L. +0.4 III 12 L. +0.5 III 1907 July 9 L. +1.5 IV 11 L. +1.5 IV Mean..... +0.73 Corr. -0.44		τ Herculis $16^h 16^m 44^s +46^\circ 33' 5''.18$ 1904 June 17 L. -0.8 III 22 L. 0.0 III 1906 July 5 L. -0.5 IV 7 L. +0.3 IV Mean..... -0.25 Corr. +0.19		η Ursæ Minoris $16^h 20^m 25^s +75^\circ 59' 9''.71$ 1898 July 18 H. +0.5 I 30 H. -1.8 I Aug. 3 H. -1.0 I 1905 Feb. 15 L. -0.4 III 23 L. -0.1 III 1906 Feb. 14 L. -0.4 IV 22 L. -1.1 IV Mean..... -0.61 Corr. +0.57	
ϕ Herculis $16^h 5^m 37^s +45^\circ 11' 49''.42$ 1898 July 18 H. -0.2 I 1904 June 17 L. +0.2 III 22 L. -1.2 III 1907 July 6 L. -0.9 IV 8 L. -0.7 IV Mean..... -0.56 Corr. +0.18		σ^2 Coronæ Borealis $16^h 10^m 56^s +34^\circ 6' 42''.90$ 1904 July 13 L. -0.3 III 1905 Apr. 20 L. -0.8 III 1906 July 13 L. 0.0 IV 18 L. -0.5 IV Mean..... -0.40 Corr. +0.02		σ Serpentis $16^h 17^m 0^s +1^\circ 15' 50''.34$ 1902 June 4 H. +0.2 I 11 H. +0.2 I July 5 H. +1.2 I 1903 May 5 H. -0.4 II July 2 H. -0.2 II 1904 June 3 L. +0.2 III 8 L. +0.1 III 1906 June 29 L. +0.7 IV 30 L. +0.8 IV July 26 L. +1.0 IV Mean..... +0.38 Corr. -0.39		η Ursæ Minoris s. p. $16^h 20^m 25^s +75^\circ 59' 10''.47$ 1905 Feb. 10 L. +0.3 III 24 L. +0.7 III 1906 Feb. 15 L. +0.1 IV 17 L. +1.4 IV Mean..... +0.62 Corr. -0.81	
87 B. Draconis $16^h 6^m 3^s +68^\circ 4' 24''.89$ 1902 Aug. 4 H. -0.5 I 1905 Feb. 6 L. -0.3 III 15 L. -0.5 III 1906 Feb. 14 L. -0.5 IV 22 L. -0.5 IV Mean..... -0.46 Corr. +0.47		ϵ Ophiuchi $16^h 13^m 2^s -4^\circ 26' 55''.49$ 1905 Apr. 24 L. +0.5 III 30 L. +0.3 III 1906 July 19 L. +1.6 IV 25 L. +0.3 IV Mean..... +0.68 Corr. -0.45		γ Herculis $16^h 17^m 31^s +19^\circ 23' 16''.31$ 1902 July 12 H. +0.8 I 1904 June 23 L. +1.1 III 25 L. +0.7 III 1907 June 24 L. -0.1 IV July 6 L. -0.9 IV Mean..... +0.32 Corr. -0.17		ω Herculis $16^h 20^m 48^s +14^\circ 15' 47''.88$ 1904 July 13 L. -0.4 III Aug. 6 L. -0.4 III 1906 July 13 L. -0.6 IV 18 L. -0.4 IV Mean..... -0.45 Corr. -0.24	
87 B. Draconis s. p. $16^h 6^m 3^s +68^\circ 4' 24''.92$ 1905 Feb. 7 L. +1.2 III 10 L. +2.2 III 1906 Feb. 13 L. +1.4 IV 17 L. +2.0 IV Mean..... +1.70 Corr. -0.85		ι Ursæ Minoris $16^h 13^m 40^s +76^\circ 7' 45''.81$ 1899 July 31 H. -1.0 I 1902 Aug. 7 H. -1.4 I 8 H. -1.7 I 1903 May 21 H. -0.1 II July 1 E. -0.2 II 1905 Feb. 17 L. -0.3 III 23 L. +0.3 III 1906 Feb. 23 L. -0.9 IV 25 L. -0.4 IV Mean..... -0.63 Corr. +0.57		ξ Coronæ Borealis $16^h 18^m 12^s +31^\circ 7' 26''.67$ 1904 June 13 L. +1.2 III 14 L. +0.7 III 1907 June 20 L. 0.0 IV 21 L. +0.5 IV Mean..... +0.60 Corr. -0.02		98 B. Draconis $16^h 22^m 14^s +55^\circ 25' 56''.92$ 1905 Apr. 24 L. -0.5 III 30 L. -1.2 III 1907 July 8 L. -0.3 IV 9 L. -0.3 IV Mean..... -0.58 Corr. +0.31	
c^1 Scorpii $16^h 6^m 9^s -27^\circ 40' "$ 1902 July 2 H. 59.78 I 12 H. 60.32 I 1903 July 6 H. 61.41 II 1904 June 3 L. 60.37 III 8 L. 59.97 III 1905 May 7 L. 60.16 III June 14 L. 59.46 III 1906 June 11 L. 60.20 IV 25 L. 60.18 IV Mean..... -27 40 0.21 Corr. -0.64		ι Ursæ Minoris s. p. $16^h 13^m 40^s +76^\circ 7' 45''.82$ 1905 Feb. 18 L. +1.7 III 24 L. +1.4 III 1906 Feb. 23 L. +1.6 IV 26 L. +1.6 IV Mean..... +1.58 Corr. -0.81		23 Herculis $16^h 19^m 6^s +32^\circ 33' 57''.77$ 1903 June 30 E. 0.0 II 1904 July 2 L. -0.4 III 11 L. +0.2 III 1906 July 9 L. -0.3 IV 12 L. +0.6 IV Mean..... +0.02 Corr. 0.00		η Draconis $16^h 22^m 38^s +61^\circ 44' 25''.99$ 1898 July 23 H. -1.0 I 28 H. -0.1 I 1904 Aug. 11 L. -0.9 III 12 L. -0.5 III 1907 July 12 L. -0.7 IV 13 L. -1.3 IV Mean..... -0.75 Corr. +0.40	

*The declination of NEWCOMB'S Catalogue, which is for the mean, requires a correction of $-1''.00$, which has been applied

α Scorpii
16^h 23^m 16^s -26° 12' 36".52

1904 Aug. 15 L.	+1.0	III
16 L.	+1.3	III
17 L.	+1.7	III
Mean.....	+1.33	
Corr.	-0.63	

N Scorpii
16^h 24^m 51^s -34° 29' 11".81

1903 July 1 E.	-0.1	II
6 H.	+0.4	II
8 H.	+1.4	II
19 H.	+1.3	II
1905 June 21 L.	-0.6	III
25 L.	-0.5	III
26 L.	+0.6	III
1906 July 19 L.	+1.6	IV
25 L.	+0.7	IV
Mean.....	+0.53	
Corr.	-0.67	

g Herculis
16^h 25^m 21^s +42° 6' 6".47

1904 June 17 L.	-0.8	III
22 L.	-0.9	III
1906 Feb. 25 L.	-0.6	IV
Mar. 1 L.	-1.0	IV
Mean.....	-0.82	
Corr.	+0.13	

λ Ophiuchi
16^h 25^m 52^s +2° 12' 9".38

1902 Aug. 7 H.	+0.4	I
8 H.	+1.7	I
1904 June 13 L.	0.0	III
14 L.	+0.4	III
1906 July 5 L.	0.0	IV
7 L.	+0.4	IV
26 L.	+0.3	IV
Mean.....	+0.46	
Corr.	-0.38	

β Herculis
16^h 25^m 55^s +21° 42' 26".27

1904 June 23 L.	-0.3	III
25 L.	+0.1	III
1907 June 24 L.	+0.6	IV
July 3 L.	+0.3	IV
Mean.....	+0.18	
Corr.	-0.14	

γ Herculis
16^h 27^m 21^s +49° 10' "

1903 Apr. 29 H.	42.75	II
July 7 H.	42.85	II
1904 June 3 L.	41.78	III
8 L.	41.53	III
1906 June 29 L.	42.30	IV
30 L.	42.13	IV
Mean.....	+49 10 42 22	
Corr.	+0 23	

A Draconis
16^h 28^m 11^s +68° 59' 4".32

1898 July 15 H.	+0.7	I
1904 July 2 L.	-0.7	III
11 L.	+0.2	III
1905 Feb. 15 L.	+0.6	III
17 L.	-0.1	III
1906 Feb. 22 L.	-0.9	IV
23 L.	-0.4	IV
Mean.....	-0.09	
Corr.	+0.49	

A Draconis s. p.
16^h 28^m 11^s +68° 59' 4".37

1905 Feb. 10 L.	+1.1	III
18 L.	+0.9	III
1906 Feb. 17 L.	+0.9	IV
23 L.	+0.9	IV
Mean.....	+0.95	
Corr.	-0.84	

τ Scorpii
16^h 29^m 39^s -28° 0' 31".08

1902 July 2 H.	+2.8	I
12 H.	+0.5	I
1905 Apr. 20 L.	+0.4	III
May 7 L.	+1.1	III
1907 June 27 L.	+0.8	IV
July 13 L.	+2.2	IV
Mean.....	+1.30	
Corr.	-0.64	

σ Herculis
16^h 30^m 53^s +42° 38' 35".33

1902 Aug. 4 H.	-0.3	I
1905 June 5 L.	+1.0	III
14 L.	+0.7	III
1906 July 12 L.	+0.9	IV
13 L.	+1.2	IV
Mean.....	+0.70	
Corr.	+0.14	

ζ Ophiuchi
16^h 31^m 39^s -10° 21' 52".42

1904 July 13 L.	+1.7	III
Aug. 6 L.	+0.8	III
1907 July 9 L.	+2.5	IV
12 L.	+1.4	IV
Mean.....	+1.60	
Corr.	-0.51	

γ B. Ursæ Minoris
16^h 34^m 56^s +77° 38' 45".42

1899 Aug. 1 H.	+0.9	I
1902 June 1 H.	+0.2	I
2 H.	-0.6	I
11 H.	-0.7	I
1905 Feb. 23 L.	+0.6	III
26 L.	+0.1	III
1907 Feb. 25 L.	+0.1	IV
Mar. 6 L.	+0.2	IV
Mean.....	+0.10	
Corr.	+0 58	

γ B. Ursæ Minoris s. p.
16^h 34^m 56^s +77° 38' 46".07

1905 Feb. 24 L.	+1.0	III
26 L.	+1.7	III
1907 Feb. 14 L.	+0.8	IV
15 L.	+0.7	IV
25 L.	+0.7	IV
Mean.....	+0.98	
Corr.	-0.80	

δ Scorpii
16^h 35^m 47^s -17° 32' 55".02

1902 June 4 H.	-0.4	I
1903 Apr. 18 H.	-0.1	II
May 5 H.	+1.3	II
12 H.	+2.0	II
1904 Aug. 12 L.	+1.6	III
16 L.	+1.4	III
1906 July 19 L.	+0.7	IV
25 L.	+0.6	IV
Mean.....	+0.89	
Corr.	-0.57	

ϵ Herculis
16^h 36^m 2^s +49° 7' 25".96

1903 May 21 H.	-0.1	II
June 21 H.	-0.5	II
1904 Aug. 11 L.	-0.7	III
17 L.	-0.8	III
1907 July 3 L.	-1.0	IV
8 L.	0.0	IV
Mean.....	-0.52	
Corr.	+0.23	

ζ Herculis
16^h 37^m 31^s +31° 47' 2".94

1899 July 11 H.	-1.4	I
1902 Aug. 8 H.	-0.9	I
1904 Aug. 24 L.	-0.2	III
25 L.	+0.1	III
Mean.....	-0.60	
Corr.	-0.01	

η Herculis
16^h 39^m 28^s +39° 6' 43".72

1904 Sept. 3 L.	-0.1	III
7 L.	+0.9	III
1907 July 13 L.	+0.3	IV
Mean.....	+0.37	
Corr.	+0.09	

ι B. Draconis
16^h 43^m 24^s +56° 57' 38".30

1899 July 31 H.	+0.3	I
1904 July 2 L.	+0.1	III
Aug. 15 L.	+0.1	III
1905 Mar. 10 L.	-0.1	III
May 7 L.	+0.2	III
1906 Feb. 23 L.	-1.0	IV
July 13 L.	-0.1	IV
Mean.....	-0.07	
Corr.	+0.33	

κ Ophiuchi
16^h 43^m 39^s -24° 27' "

1902 July 12 H.	52.79	I
1903 Apr. 29 H.	53.45	II
1904 July 11 L.	53.45	III
13 L.	52.97	III
1907 July 9 L.	55.43	IV
12 L.	54.03	IV
Mean.....	-24 27 53.69	
Corr.	-0.62	

ϵ Scorpii
16^h 43^m 41^s -34° 6' 43".98

1903 July 6 H.	+0.8	II
1904 Aug. 6 L.	+1.0	III
23 L.	+2.8	III
1906 Aug. 4 L.	+3.1	IV
6 L.	+1.6	IV
Mean.....	+1.86	
Corr.	-0.67	

ζ Ophiuchi
16^h 44^m 18^s -10° 36' 22".53

1899 Aug. 1 H.	+0.4	I
1902 May 29 H.	+1.3	I
30 H.	+1.4	I
1904 Aug. 16 L.	+0.5	III
17 L.	+0.3	III
1906 July 26 L.	+0.4	IV
28 L.	-0.1	IV
Mean.....	+0.60	
Corr.	-0.51	

κ Herculis
16^h 45^m 28^s +7° 25' 13".22

1902 Aug. 7 H.	+0.5	I
12 H.	+1.1	I
1903 Apr. 18 H.	+1.8	II
1904 Aug. 11 L.	+0.3	III
12 L.	+0.2	III
1906 July 12 L.	-0.4	IV
18 L.	0.0	IV
Mean.....	+0.50	
Corr.	-0.32	

γ Herculis
16^h 47^m 32^s +15° 8' 30".67

1905 Apr. 20 L.	+0.8	III
24 L.	+0.7	III
1906 July 19 L.	+0.8	IV
25 L.	+0.4	IV
1907 Mar. 15 L.	+0.2	IV
Mean.....	+0 58	
Corr.	-0.23	

δ Herculis
16^h 49^m 11^s +31° 52' 1".64

1905 June 21 L.	-1.1	III
25 L.	-1.1	III
1907 July 13 L.	-1.1	IV
Mean.....	-1.10	
Corr.	-0.01	

ϵ Ophiuchi			
16 ^h 49 ^m 17 ^s	+10° 19'	47".40	
1899 July 11 H.	+0.3	I	
1903 May 12 H.	+1.0	II	
1904 Aug. 24 L.	+0.6	III	
25 L.	+0.4	III	
Mean.....	+0.58		
Corr.	-0.29		

24 Ophiuchi			
16 ^h 50 ^m 46 ^s	-22° 59'	"	
1902 June 4 H.	28.81	I	
Aug. 8 H.	28.23	I	
1905 June 14 L.	29.09	III	
26 L.	29.22	III	
1907 July 3 L.	29.67	IV	
8 L.	29.17	IV	
Mean.....	-22 59 29.03		
Corr.	-0.61		

κ Ophiuchi			
16 ^h 52 ^m 56 ^s	+9° 31'	49".28	
1898 July 28 H.	+0.9	I	
29 H.	+0.8	I	
1905 Apr. 30 L.	+0.3	III	
May 7 L.	+1.0	III	
1907 July 9 L.	+1.1	IV	
11 L.	+0.5	IV	
Mean.....	+0.77		
Corr.	-0.30		

117 G. Scorpii			
16 ^h 55 ^m 25 ^s	-31° 59'	"	
1902 Aug. 7 H.	40.54	I	
1904 Aug. 12 L.	41.37	III	
1905 June 25 L.	42.39	III	
1906 July 13 L.	41.73	IV	
18 L.	40.56	IV	
Aug. 16 L.	41.33	IV	
Mean.....	-31 59 41.32		
Corr.	-0.66		

30 Ophiuchi			
16 ^h 55 ^m 47 ^s	-4° 4'	22".10	
1903 Aug. 21 H.	-0.5	II	
1904 July 11 L.	+1.0	III	
13 L.	+0.4	III	
1906 Aug. 6 L.	+1.0	IV	
15 L.	+0.7	IV	
17 L.	+0.6	IV	
Mean.....	+0.53		
Corr.	-0.45		

ϵ Ursæ Minoris			
16 ^h 56 ^m 12 ^s	+82° 12'	7".68	
1899 Aug. 1 H.	-0.5	I	
1904 Sept. 3 L.	-0.9	III	
1905 Feb. 17 L.	-0.1	III	
23 L.	-0.1	III	
1906 Feb. 22 L.	-0.2	IV	
23 L.	-0.5	IV	
25 L.	-0.3	IV	
Mean.....	-0.37		
Corr.	+0.63		

ϵ Ursæ Minoris s. p.			
16 ^h 56 ^m 12 ^s	+82° 12'	7".68	
1905 Feb. 18 L.	+1.3	III	
24 L.	+0.3	III	
1906 Feb. 23 L.	+1.0	IV	
26 L.	+1.3	IV	
Mean.....	+0.98		
Corr.	-0.77		

ϵ Herculis			
16 ^h 56 ^m 28 ^s	+31° 4'	24".79	
1899 July 31 H.	+0.6	I	
1904 Aug. 17 L.	+0.8	III	
1905 June 17 L.	-0.2	III	
Mean.....	+0.40		
Corr.	-0.02		

d Herculis			
16 ^h 57 ^m 55 ^s	+33° 42'	46".34	
1898 July 20 H.	-1.6	I	
1904 Aug. 11 L.	-0.9	III	
15 L.	+0.8	III	
1906 July 19 L.	0.0	IV	
26 L.	-0.1	IV	
Mean.....	-0.36		
Corr.	+0.02		

60 Herculis			
17 ^h 0 ^m 44 ^s	+12° 52'	40".83	
1902 May 29 H.	+1.2	I	
30 H.	+0.3	I	
June 1 H.	+0.8	I	
2 H.	+0.6	I	
1904 Aug. 23 L.	-0.8	III	
Sept. 2 L.	-0.8	III	
1907 July 12 L.	+0.2	IV	
13 L.	+0.2	IV	
Mean.....	+0.21		
Corr.	-0.26		

98 H ¹ . Herculis			
17 ^h 4 ^m 31 ^s	+40° 38'	48".06	
1905 Apr. 20 L.	-0.1	III	
24 L.	-0.6	III	
1907 July 8 L.	-0.7	IV	
11 L.	+0.5	IV	
Mean.....	-0.22		
Corr.	+0.11		

η Ophiuchi			
17 ^h 4 ^m 39 ^s	-15° 36'	3".62	
1902 June 4 H.	+0.6	I	
1904 Aug. 24 L.	+0.7	III	
25 L.	0.0	III	
Mean.....	+0.43		
Corr.	-0.55		

ζ Draconis			
17 ^h 8 ^m 30 ^s	+65° 50'	15".96	
1899 Aug. 1 H.	+0.7	I	
1902 Aug. 8 H.	-0.4	I	
1904 Sept. 3 L.	-1.0	III	
5 L.	-0.6	III	
1905 Feb. 23 L.	0.0	III	
26 L.	-0.1	III	
1906 Feb. 22 L.	-0.6	IV	
23 L.	-0.8	IV	
Mean.....	-0.35		
Corr.	+0.45		

ζ Draconis s. p.			
17 ^h 8 ^m 30 ^s	+65° 50'	15".98	
1905 Feb. 24 L.	+0.6	III	
26 L.	+1.2	III	
1906 Feb. 23 L.	+1.4	IV	
24 L.	+1.1	IV	
Mean.....	+1.08		
Corr.	-0.85		

A Ophiuchi (south star)*			
17 ^h 9 ^m 12 ^s	-26° 27'	25".72	
1903 May 12 H.	+1.00	II	
Corr.	-0.63		

A Ophiuchi (mean)*			
17 ^h 9 ^m 12 ^s	-26° 27'	28".26	
1904 July 11 L.	+2.2	III	
13 L.	+3.8	III	
1906 July 13 L.	+3.1	IV	
18 L.	+3.9	IV	
Mean.....	+3.25		
Corr.	-0.63		

α Herculis (brighter)			
17 ^h 10 ^m 5 ^s	+14° 30'	15".15	
1898 July 20 H.	+1.0	I	
1904 Aug. 6 L.	-0.1	III	
15 L.	+0.5	III	
17 L.	+0.3	III	
1906 Feb. 25 L.	+0.1	IV	
Mar. 1 L.	0.0	IV	
Mean.....	+0.30		
Corr.	-0.24		

139 G. Scorpii			
17 ^h 10 ^m 33 ^s	-32° 32'	"	
1903 July 19 H.	58.29	II	
Aug. 21 H.	57.50	II	
23 H.	57.58	II	
24 H.	57.15	II	
1905 June 14 L.	58.75	III	
25 L.	60.01	III	
1906 July 19 L.	58.59	IV	
26 L.	58.05	IV	
Mean.....	-32 32 58.24		
Corr.	-0.66		

δ Herculis			
17 ^h 10 ^m 55 ^s	+24° 57'	24".58	
1899 Aug. 7 H.	-0.4	I	
1905 June 5 L.	+0.5	III	
15 L.	+0.5	III	
17 L.	0.0	III	
Mean.....	+0.15		
Corr.	-0.10		

π Herculis			
17 ^h 11 ^m 34 ^s	+36° 55'	18".21	
1905 June 26 L.	-1.0	III	
27 L.	-0.4	III	
1907 July 13 L.	-0.3	IV	
Mean.....	-0.57		
Corr.	+0.06		

u Herculis			
17 ^h 13 ^m 38 ^s	+33° 12'	27".76	
1904 Aug. 11 L.	-0.2	III	
12 L.	-1.1	III	
1906 July 28 L.	0.0	IV	
Aug. 4 L.	-0.6	IV	
22 L.	-0.4	IV	
Mean.....	-0.46		
Corr.	+0.01		

ϵ Herculis			
17 ^h 14 ^m 13 ^s	+37° 23'	46".08	
1904 Aug. 23 L.	-0.6	III	
24 L.	-0.8	III	
1907 July 11 L.	-0.7	IV	
12 L.	-0.2	IV	
Mean.....	-0.58		
Corr.	+0.07		

ξ Ophiuchi			
17 ^h 15 ^m 1 ^s	-21° 0'	"	
1902 May 29 H.	20.10	I	
30 H.	19.95	I	
June 1 H.	20.03	I	
2 H.	19.60	I	
1903 Aug. 17 H.	20.63	II	
1905 Apr. 20 L.	21.90	III	
24 L.	21.01	III	
1907 July 8 L.	22.17	IV	
9 L.	21.11	IV	
Mean.....	-21 0 20.62		
Corr.	-0.59		

θ Ophiuchi			
17 ^h 15 ^m 52 ^s	-24° 53'	59".25	
1902 June 4 H.	+0.7	I	
1904 Aug. 25 L.	+1.0	III	
Sept. 2 L.	+1.2	III	
1906 Aug. 6 L.	+0.5	IV	
16 L.	+1.3	IV	
Mean.....	+0.04		
Corr.	-0.62		

w Herculis			
17 ^h 16 ^m 55 ^s	+32° 35'	40".87	
1905 Mar. 10 L.	0.0	III	
12 L.	-0.6	III	
Mean.....	-0.30		
Corr.	0.00		

ρ Herculis (brighter)			
17 ^h 20 ^m 14 ^s	+37° 14'	15".77	
1904 Sept. 3 L.	+0.4	III	
7 L.	+0.4	III	
1906 Aug. 15 L.	-0.5	IV	
17 L.	0.0	IV	
Mean.....	+0.08		
Corr.	+0.07		

b Ophiuchi			
17 ^h 20 ^m 16 ^s	-24° 5'	1".07	
1904 July 11 L.	+0.5	III	
Aug. 6 L.	+1.5	III	
1906 July 13 L.	+1.5	IV	
18 L.	+1.2	IV	
Mean.....	+1.18		
Corr.	-0.01		

d Ophiuchi			
17 ^h 20 ^m 58 ^s	-29° 46'	36".40	
1903 Aug. 20 H.	+3.0	II	
23 H.	+1.4	II	
1904 Aug. 11 L.	+1.2	III	
12 L.	+2.0	III	
1906 July 19 L.	+0.8	IV	
26 L.	+1.4	IV	
Mean.....	+1.63		
Corr.	-0.65		

σ Ophiuchi
 $17^h 21^m 33^s +4^{\circ} 13' 38''.08$

1899 July 31 H.	-0.4	I
1903 Aug. 21 H.	+0.9	II
24 H.	+0.1	II
1905 Mar. 2 L.	-0.9	III
June 14 L.	-0.1	III
1906 Feb. 25 L.	-0.4	IV
Mar. 1 L.	-0.1	IV
19 L.	-0.8	IV
Mean.....	-0.21	
Corr.....	-0.39	

κ Herculis
 $17^h 24^m 5^s -48^{\circ} 20' 37''.91$

1904 Aug. 15 L.	-0.5	III
17 L.	-0.7	III
1907 July 12 L.	-0.7	IV
13 L.	+0.1	IV
Mean.....	-0.45	
Corr.....	+0.22	

ς Ophiuchi
 $17^h 25^m 19^s -25^{\circ} 53' /$

1904 Aug. 23 L.	5.90	III
24 L.	6.20	III
1907 July 8 L.	6.90	IV
11 L.	6.26	IV
Mean.....	-23 53 6.32	
Corr.....	-0.61	

λ Herculis
 $17^h 26^m 42^s +26^{\circ} 11' 0''.38$

1904 Aug. 25 L.	+0.2	III
Sept. 2 L.	-0.5	III
Mean.....	-0.15	
Corr.....	-0.08	

β Draconis
 $17^h 28^m 10^s +52^{\circ} 22' 31''.23$

1898 July 20 H.	+0.8	I
1905 Apr. 20 L.	-0.3	III
May 7 L.	-1.1	III
Mean.....	-0.20	
Corr.....	+0.27	

γ Draconis
 $17^h 30^m 12^s -55^{\circ} 15' 0''.35$

1904 Mar. 23 L.	-0.6	III
Aug. 6 L.	-0.3	III
1906 July 18 L.	-0.5	IV
28 L.	-0.3	IV
Mean.....	-0.42	
Corr.....	+0.31	

α Ophiuchi
 $17^h 30^m 18^s -12^{\circ} 37' 57''.50$

1898 Sept. 24 H.	+1.0	I
28 H.	+0.8	I
29 H.	+0.4	I
30 H.	+0.3	I
Oct. 9 H.	+1.1	I
1904 Sept. 3 L.	+1.6	III
7 L.	+1.4	III
Mean.....	+0.61	
Corr.....	-0.26	

δ Draconis
 $17^h 30^m 18^s -55^{\circ} 14' 27''.80$

1904 July 11 L.	-0.3	III
Aug. 11 L.	-0.6	III
1906 Aug. 4 L.	-0.1	IV
6 L.	-0.3	IV
Mean.....	-0.32	
Corr.....	+0.31	

ξ Serpentis
 $17^h 31^m 52^s -15^{\circ} 20' 8''.29$

1904 Aug. 12 L.	+1.0	III
15 L.	+0.2	III
1906 July 19 L.	+0.3	IV
26 L.	+0.4	IV
Mean.....	+0.48	
Corr.....	-0.55	

f Draconis
 $17^h 32^m 22^s +68^{\circ} 11' 56''.11$

1904 Sept. 5 L.	-1.8	III
1905 Mar. 2 L.	-0.3	III
10 L.	-0.7	III
12 L.	-0.8	III
1906 Mar. 20 L.	-0.2	IV
22 L.	-0.5	IV
Mean.....	-0.72	
Corr.....	+0.48	

f Draconis s. P.
 $17^h 32^m 22^s +68^{\circ} 11' 56''.14$

1905 Mar. 2 L.	+1.0	III
6 L.	+2.4	III
1906 Mar. 6 L.	+1.2	IV
10 L.	-0.1	IV
Mean.....	+1.12	
Corr.....	-0.84	

\circ Serpentis
 $17^h 35^m 48^s -12^{\circ} 40' 18''.07$

1903 Aug. 20 H.	+0.2	II
23 H.	-1.0	II
1904 Aug. 17 L.	-0.2	III
23 L.	+0.1	III
1907 July 11 L.	-0.1	IV
Mean.....	-0.20	
Corr.....	-0.53	

ζ Herculis
 $17^h 36^m 30^s +46^{\circ} 3' 34''.10$

1905 June 5 L.	-0.2	III
25 L.	-0.3	III
Mean.....	-0.25	
Corr.....	+0.10	

ω Draconis
 $17^h 37^m 32^s +68^{\circ} 48' 17''.00$

1905 Mar. 10 L.	+0.1	III
12 L.	-0.3	III
1907 Mar. 8 L.	+0.4	IV
15 L.	-0.6	IV
Mean.....	0.10	
Corr.....	+0.48	

ω Draconis s. P.
 $17^h 37^m 32^s +68^{\circ} 48' 17''.06$

1905 Mar. 2 L.	+1.5	III
6 L.	+1.2	III
1907 Mar. 2 L.	+0.6	IV
5 L.	+0.9	IV
15 L.	0.0	IV
Mean.....	+0.84	
Corr.....	-0.84	

324 B. Herculis
 $17^h 37^m 36^s +43^{\circ} 31' /$

1905 Apr. 24 L.	10.72	III
30 L.	11.95	III
1907 July 8 L.	11.73	IV
13 L.	9.19	IV
Mean.....	+43 31 10.90	
Corr.....	+0.15	

β Ophiuchi
 $17^h 38^m 32^s +4^{\circ} 36' 33''.34$

1904 Aug. 24 L.	+0.1	III
25 L.	+0.2	III
1907 July 9 L.	+1.1	IV
12 L.	+0.3	IV
Mean.....	+0.42	
Corr.....	-0.36	

X Sagittarii
 $17^h 41^m 16^s -27^{\circ} 47' /$

1903 Aug. 21 H.	32.66	II
24 H.	33.01	II
1904 Sept. 2 L.	32.72	III
3 L.	33.24	III
1906 July 26 L.	32.99	IV
Aug. 4 L.	33.49	IV
Mean.....	-27 47 33.02	
Corr.....	-0.64	

μ Herculis
 $17^h 42^m 33^s +27^{\circ} 46' 40''.53$

1904 Mar. 16 L.	-0.1	III
23 L.	+0.3	III
1906 Aug. 15 L.	+0.8	IV
17 L.	+0.3	IV
Mean.....	+0.32	
Corr.....	-0.06	

γ Ophiuchi
 $17^h 42^m 53^s +2^{\circ} 44' 41''.01$

1904 Sept. 7 L.	+0.4	III
15 L.	+0.6	III
1906 July 28 L.	-0.3	IV
Aug. 6 L.	+0.1	IV
Mean.....	+0.20	
Corr.....	-0.38	

ϕ^1 Draconis
 $17^h 43^m 43^s +72^{\circ} 11' 51''.11$

1905 Apr. 20 L.	-0.3	III
May 7 L.	-0.6	III
1906 Mar. 20 L.	-0.6	IV
22 L.	-0.7	IV
Mean.....	-0.55	
Corr.....	+0.52	

ϕ^1 Draconis s. P.
 $17^h 43^m 43^s +72^{\circ} 11' 51''.19$

1904 Feb. 3 L.	+1.2	III
1906 Mar. 6 L.	+0.7	IV
10 L.	+0.4	IV
Mean.....	+0.77	
Corr.....	-0.83	

87 Herculis
 $17^h 44^m 46^s +25^{\circ} 39' 21''.21$

1903 Aug. 17 H.	0.0	II
1904 Aug. 11 L.	+0.3	III
12 L.	+0.1	III
1906 July 18 L.	-0.1	IV
19 L.	+0.4	IV
Mean.....	+0.14	
Corr.....	-0.09	

z Herculis
 $17^h 47^m 20^s +48^{\circ} 25' 16''.37$

1903 Aug. 20 H.	0.0	II
23 H.	-1.4	II
1904 July 11 L.	-1.0	III
Aug. 6 L.	-0.8	III
Mean.....	-0.80	
Corr.....	+0.22	

168 H¹. Herculis
 $17^h 48^m 49^s +40^{\circ} 0' 14''.35$

1904 Aug. 15 L.	-0.4	III
17 L.	-0.1	III
1906 Aug. 23 L.	0.0	IV
Sept. 4 L.	-0.7	IV
5 L.	-0.5	IV
Mean.....	-0.34	
Corr.....	+0.10	

9 G. Sagittarii
 $17^h 50^m 2^s -18^{\circ} 47' /$

1904 Aug. 23 L.	3.52	III
24 L.	4.13	III
1907 July 8 L.	4.87	IV
11 L.	4.77	IV
Mean.....	-18 47 4.32	
Corr.....	-0.58	

89 Herculis
 $17^h 51^m 23^s +26^{\circ} 3' 56''.97$

1903 Aug. 21 H.	+0.8	II
1904 Aug. 25 L.	-0.8	III
Sept. 2 L.	-0.8	III
Mean.....	-0.27	
Corr.....	-0.09	

ξ Draconis
 $17^h 51^m 48^s +56^{\circ} 53' 18''.34$

1904 Sept. 3 L.	-2.0	III
7 L.	-1.2	III
1906 Sept. 6 L.	-0.8	IV
7 L.	-1.0	IV
Mean.....	-1.25	
Corr.....	+0.33	

θ Herculis			τ Ophiuchi (mean)			μ Sagittarii		
17 ^h 52 ^m 49 ^s	+37° 15' 49".10		17 ^h 57 ^m 38 ^s	-8° 10' 49".07		18 ^h 7 ^m 47 ^s	-21° 5' 6".15	
1904 Sept. 22 L.	-0.3 III		1903 Aug. 20 H.	+1.6 II		1904 Aug. 12 L.	+0.9 III	
23 L.	+0.6 III		23 H.	+0.8 II		15 L.	+0.6 III	
1906 Aug. 4 L.	-0.5 IV		1904 Aug. 12 L.	+0.8 III		1906 Aug. 6 L.	+0.6 IV	
6 L.	-0.6 IV		15 L.	+1.1 III		15 L.	+1.1 IV	
Mean.....	-0.20		1906 Aug. 15 L.	+1.5 IV		Mean.....	+0.80	
Corr.	+0.07		23 L.	+1.0 IV		Corr.	-0.59	
ν Ophiuchi			γ Sagittarii			24 Ursæ Minoris		
17 ^h 53 ^m 31 ^s	-9° 45' 41".68		17 ^h 59 ^m 23 ^s	-30° 25' 32".21		18 ^h 7 ^m 48 ^s	+86° 59' 38".70	
1905 June 5 L.	+0.3 III		1904 Aug. 17 L.	+1.0 III		1903 Sept. 14 H.	-0.7 II	
14 L.	+0.7 III		23 L.	+1.7 III		1905 Apr. 30 L.	-1.1 III	
1906 July 26 L.	+0.5 IV		1906 Sept. 4 L.	+1.9 IV		May 7 L.	-1.2 III	
28 L.	+0.4 IV		5 L.	+1.0 IV		1906 July 19 L.	-1.3 IV	
Mean.....	+0.48		Mean.....	+1.40		26 L.	-1.3 IV	
Corr.	-0.50		Corr.	-0.65		Mean.....	-1.12	
ξ Herculis			70 Ophiuchi (mean)			24 Ursæ Minoris s. p.		
17 ^h 53 ^m 53 ^s	+29° 15' 30".70		18 ^h 0 ^m 24 ^s	+2° 31' 17".09		18 ^h 7 ^m 48 ^s	+86° 59' 38".70	
1904 Sept. 15 L.	+0.6 III		1903 Aug. 17 H.	+1.6 II		1904 Feb. 11 L.	+0.5 III	
16 L.	-0.3 III		24 H.	+0.8 II		1906 Mar. 5 L.	+0.6 IV	
1907 July 12 L.	-0.6 IV		1904 Aug. 6 L.	+1.1 III		17 L.	+0.3 IV	
13 L.	-0.2 IV		11 L.	+1.2 III		Mean.....	+0.47	
Mean.....	-0.12		Mean.....	+1.18		Corr.	-0.73	
Corr.	-0.04		Corr.	-0.38		5 B. Lyrae		
35 Draconis			72 Ophiuchi			18 ^h 12 ^m 32 ^s		
17 ^h 53 ^m 56 ^s	+76° 58' 35".58		18 ^h 2 ^m 37 ^s	+9° 32' 58".95		+42° 7' 30".52		
1905 Apr. 30 L.	-0.7 III		1904 Aug. 24 L.	-0.2 III		1904 Aug. 17 L.	-0.4 III	
May 7 L.	-0.2 III		Sept. 3 L.	-0.2 III		24 L.	+0.1 III	
1906 Mar. 20 L.	0.0 IV		1906 Sept. 7 L.	+1.1 IV		1906 Sept. 5 L.	+0.2 IV	
22 L.	-0.7 IV		11 L.	+0.8 IV		6 L.	-0.4 IV	
Mean.....	-0.40		Mean.....	+0.38		Mean.....	-0.12	
Corr.	+0.58		Corr.	-0.30		Corr.	+0.13	
35 Draconis s. p.			0 Herculis			36 Draconis		
17 ^h 53 ^m 56 ^s	+76° 58' 35".41		18 ^h 3 ^m 38 ^s	+28° 44' 55".02		18 ^h 13 ^m 19 ^s	+64° 21' 48".15	
1904 Feb. 6 L.	-0.2 III		1904 Sept. 7 L.	+0.4 III		1904 Aug. 6 L.	-0.7 III	
11 L.	+0.8 III		15 L.	+0.5 III		11 L.	-1.2 III	
Sept. 25 L.	+0.3 III		Mean.....	+0.45		1906 Aug. 17 L.	-0.7 IV	
1906 Mar. 6 L.	+0.9 IV		Corr.	-0.05		23 L.	-0.3 IV	
10 L.	+1.2 IV		102 Herculis			Mean.....	-0.72	
Mean.....	+0.60		18 ^h 4 ^m 29 ^s	+20° 47' "		Corr.	+0.43	
Corr.	-0.80		1903 Aug. 21 H.	56.23 II		δ Sagittarii		
γ Draconis			1904 Aug. 25 L.	54.88 III		18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
17 ^h 54 ^m 17 ^s	+51° 30' 1".84		Sept. 2 L.	55.61 III		1903 Aug. 17 H.	+1.1 II	
1905 Mar. 12 L.	-0.7 III		1906 July 28 L.	55.55 IV		21 H.	+0.5 II	
Apr. 20 L.	-0.5 III		Aug. 4 L.	55.70 IV		Sept. 16 H.	0.0 II	
Mean.....	-0.60		Mean.....	+20 47 55.59		1904 Sept. 3 L.	+1.4 III	
Corr.	+0.26		Corr.	-0.16		7 L.	+0.4 III	
67 Ophiuchi			δ Ursæ Minoris			1906 Sept. 7 L.	+1.3 IV	
17 ^h 55 ^m 38 ^s	+2° 56' 10".65		18 ^h 4 ^m 33 ^s	+86° 36' 47".96		11 L.	+0.9 IV	
1905 June 25 L.	+0.7 III		1904 Mar. 16 L.	-0.7 III		Mean.....	+0.80	
26 L.	+0.3 III		L.	-0.7 III		Corr.	-0.65	
1906 July 18 L.	+0.5 IV		23 L.	-1.1 III		η Serpentis		
19 L.	+0.6 IV		L.	-0.8 III		18 ^h 16 ^m 8 ^s	-2° 55' 32".59	
Mean.....	+0.52		28 L.	-0.1 III		1904 Sept. 21 L.	+0.7 III	
Corr.	-0.37		L.	-0.5 III		23 L.	+0.7 III	
40 Draconis			Sept. 16 L.	-1.5 III		Mean.....	+0.70	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		21 L.	-0.7 III		Corr.	-0.44	
1905 Mar. 2 L.	+0.4 III		22 L.	-1.4 III		δ Sagittarii		
6 L.	+1.2 III		L.	-1.4 III		18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
1907 Mar. 5 L.	+0.8 IV		23 L.	-0.6 III		1903 Aug. 17 H.	+1.1 II	
6 L.	+1.7 IV		27 L.	-0.4 III		21 H.	+0.5 II	
Mean.....	+1.02		40 Draconis s. p.			Sept. 16 H.	0.0 II	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		1904 Sept. 3 L.	+1.4 III	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		7 L.	+0.4 III	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		1906 Sept. 7 L.	+1.3 IV	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		11 L.	+0.9 IV	
6 L.	+1.2 III		6 L.	+1.7 IV		Mean.....	+0.80	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		Corr.	-0.65	
6 L.	+1.7 IV		Corr.	-0.78		η Serpentis		
Mean.....	+1.02		40 Draconis s. p.			18 ^h 16 ^m 8 ^s	-2° 55' 32".59	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		1904 Sept. 21 L.	+0.7 III	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		23 L.	+0.7 III	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		Mean.....	+0.70	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		Corr.	-0.44	
6 L.	+1.2 III		6 L.	+1.7 IV		δ Sagittarii		
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
6 L.	+1.7 IV		Corr.	-0.78		1903 Aug. 17 H.	+1.1 II	
Mean.....	+1.02		40 Draconis s. p.			21 H.	+0.5 II	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		Sept. 16 H.	0.0 II	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		1904 Sept. 3 L.	+1.4 III	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		7 L.	+0.4 III	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		1906 Sept. 7 L.	+1.3 IV	
6 L.	+1.2 III		6 L.	+1.7 IV		11 L.	+0.9 IV	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		Mean.....	+0.80	
6 L.	+1.7 IV		Corr.	-0.78		Corr.	-0.65	
Mean.....	+1.02		40 Draconis s. p.			η Serpentis		
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		18 ^h 16 ^m 8 ^s	-2° 55' 32".59	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		1904 Sept. 21 L.	+0.7 III	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		23 L.	+0.7 III	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		Mean.....	+0.70	
6 L.	+1.2 III		6 L.	+1.7 IV		Corr.	-0.44	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		δ Sagittarii		
6 L.	+1.7 IV		Corr.	-0.78		18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
Mean.....	+1.02		40 Draconis s. p.			1903 Aug. 17 H.	+1.1 II	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		21 H.	+0.5 II	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		Sept. 16 H.	0.0 II	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		1904 Sept. 3 L.	+1.4 III	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		7 L.	+0.4 III	
6 L.	+1.2 III		6 L.	+1.7 IV		1906 Sept. 7 L.	+1.3 IV	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		11 L.	+0.9 IV	
6 L.	+1.7 IV		Corr.	-0.78		Mean.....	+0.80	
Mean.....	+1.02		40 Draconis s. p.			Corr.	-0.65	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		η Serpentis		
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		18 ^h 16 ^m 8 ^s	-2° 55' 32".59	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		1904 Sept. 21 L.	+0.7 III	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		23 L.	+0.7 III	
6 L.	+1.2 III		6 L.	+1.7 IV		Mean.....	+0.70	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		Corr.	-0.44	
6 L.	+1.7 IV		Corr.	-0.78		δ Sagittarii		
Mean.....	+1.02		40 Draconis s. p.			18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		1903 Aug. 17 H.	+1.1 II	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		21 H.	+0.5 II	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		Sept. 16 H.	0.0 II	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		1904 Sept. 3 L.	+1.4 III	
6 L.	+1.2 III		6 L.	+1.7 IV		7 L.	+0.4 III	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		1906 Sept. 7 L.	+1.3 IV	
6 L.	+1.7 IV		Corr.	-0.78		11 L.	+0.9 IV	
Mean.....	+1.02		40 Draconis s. p.			Mean.....	+0.80	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		Corr.	-0.65	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		η Serpentis		
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		18 ^h 16 ^m 8 ^s	-2° 55' 32".59	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		1904 Sept. 21 L.	+0.7 III	
6 L.	+1.2 III		6 L.	+1.7 IV		23 L.	+0.7 III	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		Mean.....	+0.70	
6 L.	+1.7 IV		Corr.	-0.78		Corr.	-0.44	
Mean.....	+1.02		40 Draconis s. p.			δ Sagittarii		
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		18 ^h 14 ^m 36 ^s	-29° 52' 14".41	
40 Draconis s. p.			1905 Mar. 2 L.	+0.4 III		1903 Aug. 17 H.	+1.1 II	
18 ^h 7 ^m 32 ^s	+79° 59' 17".29		6 L.	+1.2 III		21 H.	+0.5 II	
1905 Mar. 2 L.	+0.4 III		1907 Mar. 5 L.	+0.8 IV		Sept. 16 H.	0.0 II	
6 L.	+1.2 III		6 L.	+1.7 IV		1904 Sept. 3 L.	+1.4 III	
1907 Mar. 5 L.	+0.8 IV		Mean.....	+1.02		7 L.	+0.4 III	
6 L.	+1.7 IV		Corr.	-0.78		1906 Sept. 7 L.	+1.3 IV	
Mean.....	+1.02		40 Draconis s. p.			11 L.	+0.9 IV	
Corr.	-0.78		18 ^h 7 ^m 32 ^s	+79° 59' 17".29		Mean.....	+0.80	

ϵ Sagittarii $18^h 17^m 32^s -34^\circ 25' 55''.06$ 1904 Sept. 15 L. +2.1 III 16 L. +1.6 III 1906 Aug. 15 L. +1.0 IV Sept. 19 L. +1.3 IV Mean..... +1.50 Corr. -0.67		ϕ Draconis s. p. $18^h 22^m 12^s +71^\circ 17' 4''.56$ 1904 Feb. 22 L. +0.8 III 24 L. +0.7 III Oct. 1 L. -1.0 III 9 L. +1.8 III 1906 Oct. 7 L. +1.2 IV 9 L. +1.5 IV Mean..... +0.83 Corr. -0.83		84 G. Sagittarii $18^h 32^m 26^s -23^\circ 35' ''$ 1903 Aug. 17 H. 23.74 II 24 H. 24.30 II 1904 Aug. 24 L. 24.04 III 25 L. 24.15 III 1906 July 26 L. 23.33 IV 28 L. 24.61 IV Mean..... -23 35 24.03 Corr. -0.61		ϕ Sagittarii $18^h 39^m 25^s -27^\circ 5' 30''.81$ 1903 Sept. 21 H. +1.1 II 24 H. +2.3 II 1904 Sept. 7 L. +1.4 III 15 L. +3.2 III Mean..... +2.00 Corr. -0.63	
446 B. Herculis $18^h 17^m 58^s +23^\circ 14' 4''.07$ 1903 Aug. 23 H. -0.4 II Sept. 18 H. +0.3 II 1904 Aug. 12 L. -0.8 III 15 L. +0.3 III 1906 July 19 L. -0.3 IV 26 L. -0.5 IV Mean..... -0.23 Corr. -0.12		b Draconis $18^h 22^m 27^s +58^\circ 44' 34''.04$ 1904 Aug. 24 L. -0.5 III 25 L. -0.2 III Mean..... -0.35 Corr. +0.36		29 H¹. Sagittarii $18^h 32^m 56^s -21^\circ 8' ''$ 1903 Aug. 21 H. 4.03 II Sept. 18 H. 5.06 II 20 H. 4.56 II 1904 Aug. 17 L. 4.91 III 23 L. 5.35 III Mean..... -21 8 4.78 Corr. -0.59		ϵ^1 Lyrae (south star) $18^h 41^m 2^s +39^\circ 33' 55''.40$ 1904 Aug. 6 L. +0.40 III Corr. +0.10	
447 B. Herculis $18^h 18^m 24^s +17^\circ 46' ''$ 1903 Aug. 24 H. 34.79 II Sept. 14 H. 34.17 II 19 H. 34.82 II 1905 Apr. 20 L. 34.25 III 24 L. 35.09 III 1906 July 28 L. 34.72 IV Aug. 6 L. 34.25 IV Mean..... +17 46 34.58 Corr. -0.20		χ Draconis $18^h 22^m 52^s +72^\circ 41' 20''.43$ 1903 Aug. 20 H. -0.1 II Sept. 20 H. -2.0 II 22 H. -0.5 II 1904 Mar. 23 L. 0.0 III 28 L. -0.4 III Sept. 30 L. -0.6 III Oct. 4 L. +0.2 III 5 L. +0.3 III 7 L. -0.4 III Mean..... -0.39 Corr. +0.53		α Lyrae $18^h 33^m 33^s +38^\circ 41' 27''.03$ 1904 Sept. 16 L. +0.2 III 20 L. -0.4 III Mean..... -0.10 Corr. +0.09		ϵ^1 Lyrae (mean)* $18^h 41^m 2^s +39^\circ 33' 55''.48$ 1904 Aug. 11 L. +0.3 III 1906 Sept. 12 L. +1.5 IV 14 L. +0.9 IV Mean..... +0.90 Corr. +0.10	
109 Herculis $18^h 19^m 26^s +21^\circ 43' 25''.21$ 1905 Apr. 30 L. +0.4 III May 7 L. -0.2 III Mean..... +0.10 Corr. -0.14		χ Draconis s. p. $18^h 22^m 52^s +72^\circ 41' 20''.53$ 1903 Feb. 12 E. +1.0 II Mar. 13 E. +0.5 II 1904 Mar. 16 L. +1.0 III 18 L. +1.6 III Oct. 2 L. +0.7 III 4 L. +0.6 III Mean..... +0.90 Corr. -0.82		156 H¹. Draconis $18^h 34^m 35^s +77^\circ 28' 9''.00$ 1903 Sept. 15 H. +0.5 II 16 H. -1.1 II 1905 Apr. 20 L. 0.0 III 24 L. -0.2 III 30 L. -0.4 III Mean..... -0.24 Corr. +0.58		110 Herculis $18^h 41^m 21^s +20^\circ 26' 59''.70$ 1904 Oct. 10 L. +1.3 III 13 L. +1.2 III 1906 Aug. 23 L. -0.3 IV Sept. 5 L. +0.4 IV Mean..... +0.65 Corr. -0.16	
μ Lyrae $18^h 20^m 56^s +39^\circ 27' 9''.20$ 1905 June 5 L. +0.5 III 14 L. +0.0 III Mean..... +0.25 Corr. +0.10		2 H. Scuti $18^h 23^m 30^s -14^\circ 37' 47''.28$ 1903 Sept. 21 H. +0.6 II 24 H. +1.4 II 1904 Sept. 2 L. +1.3 III 3 L. +0.8 III 1906 Aug. 16 L. +1.3 IV Sept. 4 L. +1.4 IV 6 L. +1.0 IV Mean..... +1.11 Corr. -0.55		156 H¹. Draconis s. p. $18^h 34^m 35^s +77^\circ 28' 8''.99$ 1903 Feb. 12 E. +1.2 II Mar. 3 E. +0.4 II 1904 Feb. 24 L. +0.6 III Mean..... +0.73 Corr. -0.80		6 H. Scuti $18^h 41^m 52^s -4^\circ 51' 17''.86$ 1903 Sept. 19 H. +2.1 II 26 H. +1.2 II 1904 Sept. 20 L. +1.2 III 23 L. +0.8 III 1906 Aug. 15 L. +0.5 IV 16 L. +0.6 IV Mean..... +1.07 Corr. -0.46	
λ Sagittarii $18^h 21^m 48^s -25^\circ 28' 38''.32$ 1904 Aug. 17 L. +1.0 III 23 L. +0.7 III Mean..... +0.85 Corr. -0.62		c Serpentis $18^h 24^m 29^s -2^\circ 3' 0''.35$ 1903 Sept. 16 H. -0.2 II 1904 Aug. 6 L. +0.9 III 11 L. +1.1 III 1906 Aug. 23 L. +1.1 IV Sept. 5 L. +1.4 IV Mean..... +0.86 Corr. -0.43		153 H¹. Draconis $18^h 35^m 54^s +65^\circ 23' 57''.66$ 1904 Oct. 4 L. -1.0 III 5 L. -1.2 III 1906 Sept. 6 L. -1.0 IV 7 L. -0.7 IV 11 L. -1.1 IV Mean..... -1.00 Corr. +0.44		111 Herculis $18^h 42^m 36^s +18^\circ 4' 12''.07$ 1903 Sept. 18 H. +1.3 II 1904 Sept. 16 L. +1.1 III 20 L. +0.7 III Mean..... +1.03 Corr. -0.19	
ϕ Draconis $18^h 22^m 12^s +71^\circ 17' 4''.57$ 1904 Oct. 1 L. -0.3 III 3 L. +0.4 III 10 L. +0.2 III 1906 Sept. 24 L. -0.6 IV Oct. 7 L. +0.2 IV Mean..... -0.02 Corr. +0.51		3 H. Scuti $18^h 29^m 46^s -8^\circ 18' 52''.28$ 1904 Aug. 12 L. +0.5 III 15 L. +0.3 III 1906 Aug. 6 L. +0.2 IV 15 L. +0.6 IV Mean..... +0.40 Corr. -0.49		4 H. Scuti $18^h 36^m 48^s -9^\circ 8' 53''.75$ 1903 Aug. 20 H. +0.6 II Sept. 22 H. +0.1 II 1904 Sept. 2 L. +0.5 III 3 L. +0.4 III Mean..... +0.40 Corr. -0.50		204 B. Draconis $18^h 44^m 29^s +52^\circ 52' 41''.25$ 1903 Aug. 21 H. -0.3 II 24 H. -0.9 II 1904 Aug. 24 L. -1.2 III 25 L. -1.4 III 1906 July 26 L. -0.2 IV 28 L. -0.7 IV Mean..... -0.78 Corr. +0.28	

* The position in Newcomb's Catalogue is for the south component.
† The position in Newcomb's Catalogue is for the north component.

30 Sagittarii
18^h 44^m 50^s -22° 16' 35".52

1903 Aug. 17 H.	+1.4	II
Sept. 15 H.	+0.7	II
20 H.	+1.1	II
1904 Aug. 17 L.	0.0	III
23 L.	-0.3	III
1906 Sept. 7 L.	+0.8	IV
11 L.	+0.2	IV
Mean.....	+0.56	
Corr.	-0.60	

3 Lyræ
18^h 46^m 23^s +33° 14' 47".21

1899 Aug. 29 H.	-1.0	I
1904 Oct. 14 L.	0.0	III
15 L.	+0.3	III
1906 Sept. 18 L.	-0.2	IV
21 L.	-0.1	IV
Mean.....	-0.20	
Corr.	+0.01	

σ Sagittarii
18^h 49^m 4^s -26° 25' 15".87

1904 Apr. 17 L.	+1.4	III
21 L.	+1.3	III
Mean.....	+1.35	
Corr.	-0.63	

50 Draconis
18^h 49^m 36^s +75° 18' 57".68

1904 May 1 L.	+0.8	III
3 L.	+0.9	III
Oct. 5 L.	+1.0	III
8 L.	+0.5	III
Mean.....	+0.80	
Corr.	+0.56	

50 Draconis S. P.
18^h 49^m 36^s +75° 18' 57".68

1904 Feb. 11 L.	+1.7	III
22 L.	+1.4	III
Oct. 9 L.	+0.8	III
14 L.	+1.1	III
Mean.....	+1.25	
Corr.	-0.81	

o Draconis
18^h 49^m 44^s +59° 15' 57".94

1904 Aug. 12 L.	-0.7	III
15 L.	-1.4	III
1906 Sept. 6 L.	-0.8	IV
12 L.	-0.9	IV
Mean.....	-0.95	
Corr.	+0.36	

θ Serpentis
18^h 51^m 15^s +4° 4' 24".27

1904 Aug. 6 L.	-0.1	III
11 L.	0.0	III
1906 Aug. 23 L.	+0.7	IV
Sept. 5 L.	+0.4	IV
Mean.....	+0.25	
Corr.	-0.36	

ξ Sagittarii
18^h 51^m 40^s -21° 14' 17".22

1903 Aug. 18 H.	+2.0	II
Sept. 14 H.	+0.2	II
19 H.	+1.6	II
21 H.	+1.7	II
1904 Sept. 2 L.	+0.3	III
3 L.	+0.7	III
Mean.....	+1.08	
Corr.	-0.60	

R Lyræ
18^h 52^m 18^s +43° 48' 51".78

1904 Sept. 7 L.	-0.7	III
15 L.	-0.1	III
Mean.....	-0.40	
Corr.	+0.16	

ε Aquilæ
18^h 55^m 5^s +14° 55' 55".98

1904 Aug. 24 L.	0.0	III
25 L.	+0.1	III
1906 Aug. 15 L.	+0.3	IV
16 L.	+0.5	IV
Mean.....	+0.22	
Corr.	-0.23	

γ Lyræ
18^h 55^m 12^s +32° 33' 8".05

1904 Sept. 21 L.	+0.5	III
23 L.	-0.1	III
1906 Sept. 18 L.	+0.1	IV
21 L.	+0.2	IV
Mean.....	+0.18	
Corr.	0.00	

υ Draconis
18^h 55^m 37^s +71° 9' 49".40

1904 Oct. 4 L.	-0.4	III
5 L.	-0.2	III
8 L.	-0.6	III
14 L.	-0.5	III
15 L.	-0.4	III
1906 Oct. 11 L.	-0.7	IV
12 L.	-1.2	IV
Mean.....	-0.57	
Corr.	+0.51	

υ Draconis S. P.
18^h 55^m 37^s +71° 9' 49".41

1904 Oct. 9 L.	-0.1	III
14 L.	0.0	III
16 L.	+0.5	III
1906 Oct. 11 L.	+1.1	IV
12 L.	+0.4	IV
Mean.....	+0.38	
Corr.	-0.83	

ζ Sagittarii
18^h 56^m 15^s -30° 1' 23".59

1903 Aug. 17 H.	0.0	II
24 H.	+1.0	II
Sept. 15 H.	+1.3	II
18 H.	-0.4	II
22 H.	+0.8	II
1904 Aug. 17 L.	+0.2	III
23 L.	+0.6	III
Mean.....	+0.50	
Corr.	-0.65	

τ Sagittarii
19^h 0^m 42^s -27° 49' 0".94

1903 Aug. 21 H.	+1.4	II
Sept. 19 H.	+1.0	II
20 H.	+1.3	II
24 H.	+0.9	II
29 H.	+2.9	II
1904 Apr. 17 L.	+0.6	III
21 L.	+0.4	III
1906 Sept. 7 L.	+0.8	IV
11 L.	+0.4	IV
Mean.....	+1.08	
Corr.	-0.64	

ζ Aquilæ
19^h 0^m 49^s +13° 42' 52".41

1904 Sept. 16 L.	+0.3	III
20 L.	+0.3	III
Mean.....	+0.30	
Corr.	-0.25	

λ Aquilæ
19^h 0^m 57^s -5° 1' 57".40

1904 Oct. 17 L.	-0.2	III
18 L.	+0.3	III
Mean.....	+0.05	
Corr.	-0.46	

17 Lyræ
19^h 3^m 39^s +32° 20' 38".96

1904 Aug. 12 L.	-1.4	III
15 L.	-1.1	III
1906 Sept. 5 L.	-1.6	IV
6 L.	-1.0	IV
Mean.....	-1.27	
Corr.	0.00	

ι Lyræ*
19^h 3^m 44^s +35° 56' 35".65

1904 Aug. 6 L.	+0.1	III
11 L.	+0.4	III
1906 Sept. 12 L.	+0.6	IV
14 L.	+0.1	IV
Mean.....	+0.30	
Corr.	+0.05	

π Sagittarii
19^h 3^m 49^s -21° 10' 57".56

1904 May 1 L.	-0.5	III
Sept. 2 L.	+0.2	III
Mean.....	-0.15	
Corr.	-0.59	

19 Lyræ
19^h 7^m 56^s +31° 6' 59".03

1899 Aug. 25 H.	-0.2	I
1904 Aug. 24 L.	+0.4	III
25 L.	+0.6	III
Mean.....	+0.27	
Corr.	-0.02	

21 Aquilæ
19^h 8^m 40^s +2° 7' 25".25

1903 Aug. 17 H.	+1.9	II
20 H.	+0.9	II
Sept. 14 H.	+1.3	II
25 H.	+1.7	II
1904 Aug. 17 L.	+0.1	III
23 L.	+0.8	III
1906 Aug. 15 L.	+0.2	IV
23 L.	+0.1	IV
Mean.....	+0.88	
Corr.	-0.38	

55 Draconis
19^h 9^m 23^s +65° 48' 40".32

1903 Aug. 18 H.	+0.2	II
24 H.	+0.2	II
Sept. 16 H.	-0.4	II
1904 Oct. 8 L.	+0.8	III
13 L.	0.0	III
Mean.....	+0.16	
Corr.	+0.45	

55 Draconis S. P.
19^h 9^m 23^s +65° 48' 40".33

1904 Oct. 14 L.	+0.1	III
16 L.	+1.1	III
Mean.....	+0.60	
Corr.	-0.85	

φ Sagittarii
19^h 9^m 25^s -25° 25' 44".87

1903 Sept. 15 H.	+1.3	II
26 H.	+1.6	II
30 H.	+2.3	II
1904 Sept. 3 L.	+1.2	III
7 L.	+0.8	III
Mean.....	+1.44	
Corr.	-0.62	

22 Aquilæ
19^h 11^m 34^s +4° 39' 30".45

1903 Aug. 21 H.	-0.2	II
Sept. 20 H.	+0.3	II
24 H.	0.0	II
29 H.	+0.5	II
1904 Sept. 15 L.	+0.5	III
16 L.	-0.3	III
1906 Sept. 7 L.	-0.5	IV
11 L.	-0.6	IV
Mean.....	-0.04	
Corr.	-0.35	

d Sagittarii
19^h 11^m 47^s -19° 7' 51".39

1904 Sept. 20 L.	+0.1	III
21 L.	+0.8	III
1906 Sept. 5 L.	+0.2	IV
6 L.	+0.2	IV
Mean.....	+0.32	
Corr.	-0.58	

δ Draconis $19^h 12^m 32^s +07^{\circ} 29' 8''.69$			δ Aquilæ $19^h 20^m 12^s +11^{\circ} 43' 51''.81$			γ Cygni $19^h 22^m 33^s +36^{\circ} 7' 1''.68$			225 B. Draconis s. p. $19^h 27^m 45^s +79^{\circ} 24' 9''.00$		
1904 Apr. 17 L.	-0.2	III	1903 Aug. 20 H.	+0.1	II	1899 Sept. 14 H.	-0.6	I	1903 Mar. 19 E.	+1.1	II
21 L.	-0.2	III	Sept. 15 H.	-0.4	II	1904 May 5 L.	+0.3	III	26 E.	+1.0	II
Oct. 17 L.	0.0	III	16 H.	+0.4	II	9 L.	-0.7	III	1904 Feb. 20 L.	+0.7	III
19 L.	-0.6	III	26 H.	+0.5	II	Mean.....	-0.33		22 L.	+0.8	III
Mean.....	-0.25		1904 Aug. 17 L.	+0.4	III	Corr.....	+0.05		Oct. 16 L.	+1.1	III
Corr.....	+0.47		23 L.	+0.3	III				17 L.	+0.1	III
			1906 Aug. 15 L.	+0.5	IV	6 Vulpeculæ $19^h 24^m 33^s +24^{\circ} 27' 43''.72$			23 L.	-0.2	III
			23 L.	+0.4	IV	1903 Aug. 18 H.	+1.3	II	Mean.....	+0.66	
			Mean.....	+0.28		Sept. 22 H.	+0.5	II	Corr.....	-0.79	
			Corr.....	-0.27		29 H.	-0.2	II	$B. D. +83^{\circ} 55' 2''$ $19^h 27^m 57^s +83^{\circ} 16' "$		
δ Draconis s. p. $19^h 12^m 32^s +67^{\circ} 29' 8''.69$			δ Aquilæ $19^h 20^m 27^s +2^{\circ} 54' 55''.42$			ϵ Aquilæ $19^h 25^m 26^s -2^{\circ} 59' 50''.23$			$B. D. +83^{\circ} 55' 2''$ s. p. $19^h 27^m 57^s +83^{\circ} 16' "$		
1904 Mar. 25 L.	-0.9	III	1904 Sept. 20 L.	+0.6	III	1899 Sept. 11 H.	-0.1	I	1902 Oct. 14 H.	7.46	I
29 L.	-0.5	III	21 L.	+1.2	III	24 H.	+0.4	I	15 H.	7.95	I
Oct. 18 L.	+0.3	III	Mean.....	+0.90		1903 Sept. 20 H.	+0.6	II	Mean.....	+83 16 7.70	
22 L.	+0.4	III	Corr.....	-0.37		21 H.	+0.4	II	Corr.....	-0.76	
Mean.....	-0.18					1904 Aug. 6 L.	+0.2	III	8 Cygni $19^h 28^m 3^s +34^{\circ} 14' 24''.98$		
Corr.....	-0.85					11 L.	-0.2	III	1899 Aug. 2 H.	+0.8	I
θ Lyrae $19^h 12^m 54^s +37^{\circ} 57' 20''.13$			186 G. Sagittarii $19^h 20^m 37^s -29^{\circ} 56' "$			Mean.....			1902 Sept. 27 H.		
1904 Oct. 6 L.	+0.5	III	1903 Aug. 17 H.	26.46	II	Corr.....	-0.11		Oct. 9 H.	-1.6	I
18 L.	+0.7	III	Sept. 30 H.	24.90	II	β Cygni $19^h 26^m 41^s +27^{\circ} 44' 58''.25$			1904 Sept. 23 L.	-0.2	III
1906 Sept. 18 L.	+0.1	IV	1904 Aug. 24 L.	27.49	III	1898 Sept. 27 H.	+1.1	I	30 L.	-0.8	III
25 L.	+0.5	IV	Sept. 2 L.	26.61	III	28 H.	-0.4	I	1906 Sept. 18 L.	-0.7	IV
Mean.....	+0.45		1906 Sept. 5 L.	27.04	IV	29 H.	+0.3	I	21 L.	-0.5	IV
Corr.....	+0.08		7 L.	27.22	IV	30 H.	+1.2	I	Mean.....	-0.44	
			Mean.....	-29 56 26.64		Oct. 10 H.	-0.4	I	Corr.....	+0.03	
			Corr.....	-0.05		11 H.	-0.6	I	μ Aquilæ $19^h 29^m 12^s +7^{\circ} 9' 59''.26$		
ω Aquilæ $19^h 13^m 7^s +11^{\circ} 24' 53''.86$			21 B. Vulpeculæ $19^h 21^m 17^s +24^{\circ} 43' 52''.52$			Mean.....			1899 Sept. 9 H.		
1904 Aug. 6 L.	+0.4	III	1903 Aug. 24 H.	+0.3	II	Corr.....	-0.44		17 L.	+0.6	III
11 L.	+0.4	III	1904 Sept. 15 L.	-0.9	III	γ Cygni $19^h 27^m 11^s +51^{\circ} 31' 0''.46$			23 L.	-0.1	III
Mean.....	+0.40		16 L.	-0.5	III	1899 Aug. 8 H.	-1.6	I	Mean.....	-0.23	
Corr.....	-0.27		1906 Sept. 6 L.	-0.2	IV	1904 May 1 L.	-0.9	III	Corr.....	-0.33	
			11 L.	+0.1	IV	3 L.	-0.7	III	h Sagittarii $19^h 30^m 37^s -25^{\circ} 6' 15''.84$		
κ Cygni $19^h 14^m 48^s +53^{\circ} 11' 2''.50$			Mean.....			Mean.....			1904 Oct. 11 L.		
1904 Sept. 30 L.	+0.3	III	Corr.....	-0.10		Corr.....			13 L.		
Oct. 11 L.	-0.3	III				Corr.....			+1.1 III		
Mean.....	0.00					Corr.....			+2.6 III		
Corr.....	+0.28					Corr.....			Mean.....		
159 B. Lyrae $19^h 15^m 38^s +40^{\circ} 10' 33''.59$			5 Vulpeculæ $19^h 21^m 51^s +19^{\circ} 53' "$			225 B. Draconis $19^h 27^m 45^s +79^{\circ} 24' 9''.01$			+1.85		
1904 Aug. 12 L.	-0.9	III	1903 Aug. 21 H.	57.21	II	1899 Aug. 8 H.	-1.6	I	Corr.....	-0.62	
Oct. 7 L.	+0.5	III	Sept. 14 H.	56.43	II	1904 May 1 L.	-0.9	III	κ Aquilæ $19^h 31^m 31^s -7^{\circ} 14' 50''.28$		
1906 Sept. 14 L.	-0.6	IV	24 H.	57.02	II	3 L.	-0.7	III	1898 Sept. 16 H.	+1.1	I
21 L.	-0.6	IV	1904 Aug. 25 L.	55.53	III	8 L.	-0.9	IV	17 H.	+0.3	I
Mean.....	-0.40		Sept. 7 L.	56.29	III	Mean.....	+0.05		23 H.	+0.1	I
Corr.....	+0.11		Mean.....	+19 53 56.50		Corr.....	-0.06		24 H.	0.0	I
			Corr.....	-0.17		Corr.....			5 L.	+0.9	III
						Corr.....			9 L.	+0.9	III
τ Draconis $19^h 17^m 29^s +73^{\circ} 10' 12''.20$			λ Ursæ Minoris $19^h 22^m 30^s +88^{\circ} 59' 15''.85$			γ Cygni $19^h 27^m 11^s +51^{\circ} 31' 0''.46$			1906 Aug. 15 L.		
1904 May 1 L.	+0.1	III	1904 May 11 L.	-0.5	III	1899 Aug. 8 H.	-1.6	I	23 L.	+0.2	IV
3 L.	-0.2	III	Oct. 13 L.	-1.4	III	1904 May 1 L.	-0.9	III	Mean.....	+0.39	
Oct. 22 L.	+0.1	III	14 L.	-0.4	III	3 L.	-0.7	III	Corr.....	-0.48	
24 L.	-0.3	III	15 L.	-0.4	III	1906 Oct. 6 L.	-0.7	IV	κ Aquilæ $19^h 31^m 31^s -7^{\circ} 14' 50''.28$		
Mean.....	-0.08		17 L.	-0.5	III	8 L.	-0.9	IV	1898 Sept. 16 H.	+1.1	I
Corr.....	+0.54		Mean.....	-0.64		Mean.....	-0.06		17 H.	+0.3	I
			Corr.....	+0.70		Corr.....	+0.26		23 H.	+0.1	I
						Corr.....			24 H.	0.0	I
τ Draconis s. p. $19^h 17^m 29^s +73^{\circ} 10' 12''.19$			λ Ursæ Minoris s. p. $19^h 22^m 30^s +88^{\circ} 59' 15''.84$			225 B. Draconis $19^h 27^m 45^s +79^{\circ} 24' 9''.01$			1904 May 5 L.		
1904 Feb. 11 L.	0.0	III	1898 Mar. 17 H.	+1.1	I	1899 Sept. 30 H.	-0.3	I	5 L.	+0.9	III
27 L.	+0.5	III	1903 Mar. 12 E.	+1.2	II	1903 Sept. 25 H.	-1.6	II	9 L.	+0.9	III
Oct. 17 L.	-0.2	III	17 E.	+1.5	II	Oct. 7 H.	-0.7	II	1906 Aug. 15 L.	+0.4	IV
23 L.	+0.8	III	1904 Mar. 1 L.	+1.4	III	1904 May 15 L.	-0.6	III	23 L.	+0.2	IV
Mean.....	+0.28		4 L.	+1.1	III	Oct. 15 L.	-0.6	III	Mean.....	+0.39	
Corr.....	-0.82		Oct. 14 L.	+0.2	III	17 L.	-1.2	III	Corr.....	-0.48	
			16 L.	+0.6	III	22 L.	-0.7	III	κ Aquilæ $19^h 31^m 31^s -7^{\circ} 14' 50''.28$		
			Mean.....	+1.01		24 L.	-0.4	III	1898 Sept. 16 H.	+1.1	I
			Corr.....	-0.71		Mean.....	-0.81		17 H.	+0.3	I
						Corr.....	+0.60		23 H.	+0.1	I
						Corr.....			24 H.	0.0	I
						Corr.....			5 L.	+0.9	III
						Corr.....			9 L.	+0.9	III
						Corr.....			1906 Aug. 15 L.	+0.4	IV
						Corr.....			23 L.	+0.2	IV
						Corr.....			Mean.....	+0.39	
						Corr.....			Corr.....	-0.48	

ϵ Sagittæ $19^h 32^m 40^s +16^\circ 14' 10''.82$			β Sagittæ $19^h 36^m 33^s +17^\circ 14' 39''.30$			γ Aquilæ $19^h 41^m 30^s +10^\circ 22' 9''.95$			ϵ Draconis $19^h 48^m 31^s +70^\circ 0' 47''.67$		
1899 Aug. 3 H.	-0.4	I	1898 Oct. 11 H.	-0.2	I	1898 Sept. 19 H.	+1.2	I	1898 Sept. 29 H.	+0.4	I
Sept. 13 H.	+0.3	I	12 H.	-0.1	I	24 H.	+0.8	I	Oct. 10 H.	0.0	I
1903 Aug. 17 H.	+1.3	II	13 H.	+0.2	I	28 H.	-0.1	I	11 H.	+1.5	I
24 H.	+1.3	II	1904 May 11 L.	+0.4	III	30 H.	0.0	I	1903 Aug. 18 H.	+0.4	II
Sept. 26 H.	+0.7	II	15 L.	+0.8	III	Oct. 10 H.	-0.2	I	Sept. 19 H.	-1.0	II
1904 Oct. 6 L.	0.0	III	Mean.....	+0.20		1904 Apr. 17 L.	+0.4	III	24 H.	-0.7	II
7 L.	+0.5	III	Corr.	-0.20		21 L.	0.0	III	1904 May 11 L.	-0.7	III
1906 Sept. 5 L.	+1.0	IV				Mean.....	+0.30		15 L.	+0.6	III
6 L.	+0.5	IV				Corr.	-0.29		Oct. 17 L.	+0.3	III
Mean.....	+0.58								18 L.	-0.3	III
Corr.	-0.21								24 L.	-0.6	III
									25 L.	+1.0	III
									1906 Oct. 29 L.	-0.5	IV
									30 L.	-0.3	IV
									Mean.....	+0.01	
									Corr.	+0.50	
51 B. Cygni $19^h 33^m 21^s +43^\circ 28' "$			ϵ Sagittarii $19^h 36^m 48^s -16^\circ 21' 30''.25$			δ Cygni $19^h 41^m 51^s +44^\circ 53' 11''.75$			ϵ Draconis S. P. $19^h 48^m 31^s +70^\circ 0' 47''.71$		
1899 Aug. 7 H.	56.69	I	1903 Aug. 18 H.	+0.7	II	1898 Sept. 27 H.	+0.9	I	1903 Mar. 18 E.	+2.3	I
Sept. 14 H.	55.83	I	Sept. 19 H.	+0.9	II	1899 Sept. 11 H.	-0.8	I	1904 Mar. 29 L.	+0.7	III
1904 Sept. 20 L.	55.21	III	20 H.	+1.3	II	27 H.	+0.6	I	Apr. 2 L.	+0.9	III
21 L.	54.95	III	1904 May 18 L.	+1.1	III	1904 May 1 L.	-0.6	III	Oct. 16 L.	+1.2	III
1906 Sept. 7 L.	55.51	IV	24 L.	+1.1	III	5 L.	-0.8	III	17 L.	+0.7	III
11 L.	55.83	IV	1906 Sept. 14 L.	+0.9	IV	1906 Aug. 16 L.	+0.6	IV	23 L.	+1.5	III
Mean.....	+43 28 55.67		19 L.	+1.2	IV	Oct. 23 L.	-0.6	IV	24 L.	+1.2	III
Corr.	+0.15		Mean.....	+1.03		Mean.....	-0.10		1906 Nov. 1 L.	+1.1	IV
			Corr.	-0.56		Corr.	+0.17		2 L.	+1.4	IV
									Mean.....	+1.22	
									Corr.	-0.84	
θ Cygni $19^h 33^m 46^s +49^\circ 59' 22''.49$			10 Vulpeculæ $19^h 39^m 33^s +25^\circ 31' 56''.83$			δ Sagittæ $19^h 42^m 56^s +18^\circ 17' 14''.91$			β Aquilæ $19^h 50^m 24^s +6^\circ 9' 24''.28$		
1899 Aug. 20 H.	+0.7	I	1899 Oct. 9 H.	-0.2	I	1899 Aug. 7 H.	+0.6	I	1898 Sept. 19 H.	+0.9	I
Oct. 3 H.	+0.3	I	1904 Aug. 6 L.	-0.4	III	22 H.	+0.4	I	24 H.	+0.4	I
1904 Oct. 18 L.	-0.5	III	11 L.	-0.3	III	Sept. 13 H.	+1.0	I	28 H.	+0.5	I
19 L.	-0.5	III	Oct. 17 L.	-0.1	III	1904 May 22 L.	+0.1	III	1904 Sept. 7 L.	-0.2	III
Mean.....	0.00		1906 Aug. 4 L.	+0.3	IV	June 10 L.	+0.5	III	16 L.	0.0	III
Corr.	+0.24		Oct. 6 L.	-0.2	IV	1906 Sept. 4 L.	+0.3	IV	Mean.....	+0.32	
			Mean.....	-0.15		5 L.	+0.3	IV	Corr.	-0.34	
			Corr.	-0.09		Mean.....	+0.46				
						Corr.	-0.19				
σ Aquilæ $19^h 34^m 16^s +5^\circ 10' 11''.49$			228 G. Sagittarii $19^h 39^m 38^s -32^\circ 8' "$			ζ Sagittæ $19^h 44^m 32^s +18^\circ 53' 28''.17$			ϕ Aquilæ $19^h 51^m 30^s +11^\circ 9' 29''.65$		
1899 Aug. 22 H.	-1.1	I	1903 Sept. 15 H.	59.57	II	1899 Aug. 8 H.	0.0	I	1899 Aug. 2 H.	-1.1	I
Sept. 11 H.	-1.2	I	Oct. 7 H.	58.74	II	24 H.	0.0	I	22 H.	-1.1	I
1903 Aug. 20 H.	-0.5	II	1904 Sept. 2 L.	58.43	III	Sept. 14 H.	+1.2	I	Sept. 12 H.	-1.4	I
Sept. 24 H.	+0.9	II	7 L.	58.98	III	1903 Aug. 24 H.	+0.8	II	1903 Aug. 20 H.	-0.6	II
1904 Sept. 15 L.	-0.5	III	1906 Sept. 21 L.	58.32	IV	Sept. 18 H.	-0.4	II	Sept. 20 H.	+0.4	II
16 L.	-0.1	III	29 L.	58.26	IV	1904 Sept. 20 L.	+0.2	III	26 H.	+0.3	II
Mean.....	-0.42		Mean.....	-32 8 58.72		21 L.	0.0	III	1904 Aug. 6 L.	-0.7	III
Corr.	-0.35		Corr.	-0.66		1906 Sept. 6 L.	+0.2	IV	11 L.	+0.1	III
						7 L.	+0.3	IV	1906 Sept. 19 L.	+0.6	IV
						Mean.....	+0.26		25 L.	0.0	IV
						Corr.	-0.18		Mean.....	-0.35	
									Corr.	-0.28	
54 Sagittarii $19^h 35^m 0^s -16^\circ 31' 21''.61$			f Sagittarii $19^h 40^m 32^s -20^\circ 0' 5''.93$			α Aquilæ $19^h 45^m 54^s +8^\circ 36' 14''.80$			g Sagittarii $19^h 52^m 17^s -15^\circ 45' 24''.53$		
1903 Sept. 14 H.	+2.6	II	1903 Sept. 30 H.	+0.7	II	1898 Sept. 16 H.	-1.0	I	1903 Sept. 15 H.	+0.5	II
21 H.	+1.4	II	1904 Sept. 23 L.	+0.9	III	17 H.	+0.1	I	21 H.	+1.0	II
29 H.	+2.0	II	29 L.	-0.1	III	23 H.	+0.8	I	29 H.	+0.7	II
1904 Aug. 24 L.	+1.0	III	1906 Aug. 15 L.	+0.4	IV	Oct. 12 H.	+1.9	I	1904 Aug. 15 L.	+0.6	III
25 L.	+0.7	III	23 L.	-0.8	IV	13 H.	+0.9	I	17 L.	+0.8	III
Mean.....	+1.54		Mean.....	+0.22		1899 Apr. 16 H.	+0.2	I	1906 Sept. 29 L.	+0.7	IV
Corr.	-0.56		Corr.	-0.59		1904 Oct. 28 L.	+1.7	III	Oct. 15 L.	+0.3	IV
						29 L.	+0.7	III	Mean.....	+0.66	
						Mean.....	+0.66		Corr.	-0.55	
						Corr.	-0.31				
14 Cygni $19^h 36^m 11^s +42^\circ 35' 13''.12$			15 Cygni $19^h 40^m 40^s +37^\circ 6' 46''.16$			η Aquilæ $19^h 47^m 23^s +0^\circ 44' 55''.98$					
1899 Aug. 24 H.	-0.5	I	1899 Aug. 2 H.	-0.7	I	1899 Aug. 29 H.	-0.6	I			
Sept. 24 H.	+0.4	I	1904 Aug. 17 L.	-0.9	III	1904 Oct. 6 L.	+1.1	III			
1904 Aug. 12 L.	+0.5	III	23 L.	-0.5	III	11 L.	+1.4	III			
15 L.	-0.2	III	1906 Oct. 8 L.	+0.3	IV	1906 Sept. 11 L.	+0.2	IV			
Mean.....	+0.05		15 L.	+0.1	IV	12 L.	+0.2	IV			
Corr.	+0.14		Mean.....	-0.34		Mean.....	+0.46				
			Corr.	+0.07		Corr.	-0.40				

ϕ Cygni
19^h 53^m 3^s +52° 10' 23".99
1899 Aug. 30 H. -0.4 I
20 H. -0.8 I
Sept. 11 H. +0.6 I
1904 May 18 L. +0.2 III
22 L. -0.2 III
Mean..... -0.12
Corr. +0.27

γ Sagittæ
19^h 54^m 19^s +19° 13' 13".58
1898 Sept. 30 H. -0.2 I
1904 May 1 L. -0.4 III
5 L. -0.5 III
Mean..... -0.37
Corr. -0.18

63 Sagittarii
19^h 56^m 23^s -13° 54' "
1899 Aug. 8 H. 51.54 I
Sept. 14 H. 51.23 I
27 H. 49.81 I
1903 Sept. 18 H. 50.66 II
22 H. 50.96 II
1904 Aug. 23 L. 50.16 III
Sept. 15 L. 50.12 III
1906 Sept. 4 L. 49.93 IV
5 L. 50.07 IV
Mean..... -13 54 50.50
Corr. -0.54

ϵ Sagittarii
19^h 56^m 31^s -27° 59' 16".37
1904 Aug. 24 L. +0.4 III
Sept. 2 L. +0.9 III
Mean..... +0.65
Corr. -0.64

15 Vulpeculæ
19^h 56^m 59^s +27° 28' 37".43
1899 Oct. 3 H. +1.6 I
1904 Sept. 27 L. +0.7 III
29 L. +0.5 III
Oct. 6 L. 0.0 III
11 L. +0.4 III
1906 Sept. 6 L. -0.3 IV
11 L. +0.3 IV
21 L. +0.7 IV
Mean..... +0.56
Corr. -0.07

269 G. Sagittarii
19^h 57^m 49^s -22° 52' "
1903 Oct. 7 H. 34.22 II
12 H. 33.21 II
21 H. 34.43 II
1904 Sept. 21 L. 33.82 III
23 L. 32.84 III
Mean..... -22 52 33.70
Corr. -0.61

Groombridge 3402
19^h 59^m 1^s +88° 49' "
1903 Sept. 14 H. 33.38 II
30 H. 32.71 II
Oct. 18 H. 33.00 II
1904 Oct. 27 L. 33.72 III
28 L. 32.85 III
Mean..... +88 49 33.25
Corr. -0.69

Groombridge 3402 S. P.
19^h 59^m 1^s +88° 49' "
1904 Oct. 28 L. 34.18 III
30 L. 33.45 III
Mean..... +88 49 33.82
Corr. -0.71

τ Aquilæ
19^h 59^m 15^s +6° 59' 44".97
1898 Sept. 16 H. 0.0 I
17 H. -0.3 I
23 H. -0.1 I
24 H. +0.7 I
26 H. +0.4 I
1904 Sept. 16 L. 0.0 III
20 L. -0.5 III
1906 Sept. 7 L. -0.3 IV
19 L. -1.5 IV
Oct. 8 L. -0.6 IV
Mean..... -0.22
Corr. -0.33

b^2 Cygni
20^h 5^m 43^s +36° 32' 42".29
1899 Aug. 22 H. -0.9 I
Sept. 27 H. +1.5 I
1904 May 18 L. -0.6 III
22 L. +0.1 III
June 15 L. -0.2 III
Oct. 17 L. +0.1 III
1906 Oct. 15 L. +0.1 IV
23 L. +0.4 IV
Mean..... +0.06
Corr. +0.06

θ Aquilæ
20^h 6^m 9^s -1° 7' 5".37
1898 Sept. 28 H. -0.5 I
29 H. -0.9 I
30 H. -0.3 I
Oct. 10 H. 0.0 I
11 H. -0.6 I
13 H. +0.5 I
1899 Apr. 16 H. -0.9 I
1904 May 11 L. +0.1 III
15 L. +0.2 III
Mean..... -0.27
Corr. -0.42

20 Vulpeculæ
20^h 7^m 49^s +26° 10' 48".29
1899 Aug. 2 H. +0.9 I
Oct. 9 H. -0.4 I
1903 Sept. 18 H. -0.4 II
21 H. -0.1 II
1904 Aug. 11 L. -0.5 III
23 L. -0.1 III
1906 Sept. 4 L. +0.1 IV
5 L. -0.4 IV
Mean..... -0.11
Corr. -0.08

66 Aquilæ
20^h 8^m 4^s -1° 18' 32".33
1899 Sept. 14 H. -1.1 I
1903 Aug. 18 H. -0.6 I
Sept. 14 H. +0.3 II
22 H. -0.9 II
1904 Aug. 15 L. -0.5 III
24 L. -0.8 III
Mean..... -0.60
Corr. -0.42

ρ Aquilæ
20^h 9^m 39^s +14° 53' 34".45
1899 Aug. 8 H. -0.9 I
20 H. -2.1 I
Sept. 24 H. -2.2 I
1903 Sept. 20 H. +0.5 II
26 H. 0.0 II
Oct. 12 H. +0.2 II
1904 Oct. 19 L. -0.1 III
21 L. -0.2 III
Mean..... -0.60
Corr. -0.23

68 Draconis
20^h 9^m 57^s +61° 40' 32".57
1903 Sept. 29 H. +0.6 II
30 H. -0.4 II
1904 Sept. 2 L. +0.4 III
15 L. -0.4 III
16 L. +0.3 III
1906 Sept. 7 L. +0.3 IV
19 L. +0.4 IV
Mean..... +0.17
Corr. +0.40

30 Cygni
20^h 10^m 9^s +46° 30' 46".53
1899 Sept. 12 H. -0.6 I
1904 Sept. 20 L. -0.8 III
21 L. -0.1 III
Mean..... -0.50
Corr. +0.19

ϕ^1 Cygni
20^h 10^m 29^s +46° 26' 16".60
1899 Sept. 30 H. 0.0 I
1904 May 5 L. -0.3 III
Sept. 23 L. -0.5 III
27 L. -0.6 III
Mean..... -0.35
Corr. +0.19

33 Cygni
20^h 11^m 4^s +56° 15' 43".10
1899 Oct. 3 H. -0.9 I
1904 Oct. 29 L. -0.3 III
Nov. 1 L. -0.4 III
1906 Oct. 6 L. -1.7 IV
8 L. -0.9 IV
Mean..... -0.84
Corr. +0.33

α^1 Capricorni
20^h 12^m 6^s -12° 49' 2".28
1904 June 15 L. -0.2 III
20 L. +0.3 III
1906 Sept. 6 L. +0.5 IV
11 L. +0.6 IV
Mean..... +0.40
Corr. -0.53

4 Capricorni
20^h 12^m 9^s -22° 7' 7".96
1903 Sept. 15 H. +0.7 II
19 H. +0.2 II
Oct. 7 H. +0.3 II
13 H. +0.2 II
19 H. +1.1 II
1904 Sept. 29 L. +0.6 III
Oct. 6 L. +1.0 III
1906 Sept. 21 L. +1.7 IV
29 L. +0.8 IV
Mean..... +0.73
Corr. -0.60

κ Cephei
20^h 12^m 16^s +77° 24' 37".28
1899 Sept. 11 H. -1.4 I
1904 Oct. 24 L. +0.3 III
27 L. 0.0 III
Nov. 2 L. +0.1 III
1906 Oct. 29 L. +0.2 IV
30 L. -0.1 IV
Mean..... -0.15
Corr. +0.58

κ Cephei S. P.
20^h 12^m 16^s +77° 24' 37".30
1904 Oct. 22 L. +0.5 III
23 L. +1.2 III
24 L. +0.5 III
27 L. +1.7 III
Nov. 5 L. +1.6 III
1906 Nov. 1 L. +1.4 IV
2 L. +0.8 IV
Mean..... +1.10
Corr. -0.80

24 Vulpeculæ
20^h 12^m 30^s +24° 21' 46".46
1904 Sept. 7 L. -0.3 III
Oct. 18 L. -0.1 III
Mean..... -0.20
Corr. -0.11

α^2 Capricorni
20^h 12^m 30^s -12° 51' 17".50
1898 Sept. 17 H. -0.3 I
19 H. -0.1 I
23 H. +0.8 I
24 H. -0.3 I
27 H. +1.7 I
1904 May 24 L. +1.4 III
June 10 L. +0.3 III
Mean..... +0.50
Corr. -0.53

Groombridge 3212
20^h 14^m 0^s +84° 22' "
1903 Nov. 7 H. 37.70 II
10 H. 36.50 II
Mean..... +84 22 37.10
Corr. +0.65

Groombridge 3212 S. P.
20^h 14^m 0^s +84° 22' "
1903 Nov. 7 H. 38.54 II
9 H. 39.18 II
10 H. 37.97 II
Mean..... +84 22 38.56
Corr. -0.75

β Capricorni			
20 ^h 15 ^m 24 ^s	-15° 5' 49".97		
1904 May 18 L.	+0.7 III		
22 L.	+0.4 III		
1906 Sept. 12 L.	+0.8 IV		
14 L.	+0.4 IV		
Mean.....	+0.58		
Corr.	-0.55		

176 B. Cygni			
20 ^h 16 ^m 38 ^s	+39° 5' 16".83		
1899 Sept. 27 H.	-0.6 I		
1904 Oct. 11 L.	-0.9 • III		
17 L.	-1.3 III		
Mean.....	-0.93		
Corr.	+0.09		

γ Cygni			
20 ^h 18 ^m 38 ^s	+39° 56' 11".28		
1898 Sept. 28 H.	-0.4 I		
30 H.	-0.6 I		
Oct. 10 H.	+0.8 I		
11 H.	-0.1 I		
12 H.	0.0 I		
13 H.	-0.4 I		
1899 Apr. 16 H.	+0.1 I		
1904 May 11 L.	+0.3 III		
15 L.	-0.1 III		
Mean.....	-0.04		
Corr.	+0.10		

296 G. Sagittarii			
20 ^h 19 ^m 20 ^s	-28° 59' "		
1903 Sept. 14 H.	14.89 II		
18 H.	14.98 II		
21 H.	15.21 II		
22 H.	16.34 II		
Oct. 14 H.	14.41 II		
1904 Aug. 15 L.	14.63 III		
23 L.	14.33 III		
1906 Sept. 5 L.	15.19 IV		
7 L.	15.49 IV		
Mean.....	-28 59 15.05		
Corr.	-0.64		

π Capricorni			
20 ^h 21 ^m 36 ^s	-18° 32' 22".25		
1904 Aug. 11 L.	+0.1 III		
24 L.	+0.3 III		
1906 Sept. 4 L.	+0.4 IV		
6 L.	-0.5 IV		
Mean.....	+0.08		
Corr.	-0.58		

ρ Capricorni			
20 ^h 23 ^m 9 ^s	-18° 8' 39".66		
1904 Aug. 17 L.	-0.3 III		
Sept. 7 L.	-0.1 III		
1906 Sept. 19 L.	+0.7 IV		
21 L.	+0.9 IV		
Mean.....	+0.30		
Corr.	0.57		

40 Cygni			
20 ^h 23 ^m 52 ^s	+38° 6' 42".42		
1899 Aug. 20 H.	-0.9 I		
Sept. 14 H.	-0.4 I		
24 H.	+0.2 I		
1904 Sept. 2 L.	-0.1 III		
16 L.	-0.6 III		
Mean.....	-0.36		
Corr.	+0.08		

69 Aquilæ			
20 ^h 24 ^m 25 ^s	-3° 13' 4".77		
1899 Aug. 24 H.	-0.2 I		
Sept. 30 H.	-0.1 I		
Oct. 9 H.	-0.7 I		
1903 Aug. 18 H.	+0.5 II		
Sept. 15 H.	+1.6 II		
29 H.	+1.1 II		
1904 June 10 L.	0.0 III		
15 L.	-0.3 III		
1906 Sept. 29 L.	0.0 IV		
Oct. 6 L.	+0.2 IV		
Mean.....	+0.21		
Corr.	-0.44		

Groombridge 3260			
20 ^h 24 ^m 28 ^s	+84° 13' "		
1903 Nov. 8 H.	40.87 II		
9 H.	41.50 II		
10 H.	40.84 II		
Mean.....	+84 13 41.07		
Corr.	+0.65		

Groombridge 3260 S. P.			
20 ^h 24 ^m 28 ^s	+84° 13' "		
1903 Nov. 7 H.	43.80 II		
8 H.	42.94 II		
10 H.	42.90 II		
Mean.....	+84 13 43.21		
Corr.	-0.75		

41 Cygni			
20 ^h 25 ^m 10 ^s	+30° 2' 5".21		
1899 Sept. 12 H.	0.0 I		
Oct. 20 H.	-1.2 I		
1904 May 22 L.	-0.4 III		
24 L.	-0.4 III		
1906 Sept. 18 L.	-0.4 IV		
Oct. 15 L.	-0.1 IV		
Mean.....	-0.42		
Corr.	-0.03		

42 Cygni			
20 ^h 25 ^m 32 ^s	+36° 7' 15".01		
1904 June 20 L.	-0.7 III		
Sept. 15 L.	-0.5 III		
Oct. 11 L.	-0.3 III		
17 L.	-0.0 III		
Mean.....	-0.38		
Corr.	+0.05		

ω^1 Cygni			
20 ^h 26 ^m 58 ^s	+48° 36' 55".16		
1899 Oct. 19 H.	+0.3 I		
1903 Oct. 13 H.	+0.5 II		
1904 Sept. 21 L.	+0.2 III		
23 L.	-0.3 III		
1906 Oct. 23 L.	-0.2 IV		
26 L.	-0.2 IV		
Mean.....	+0.05		
Corr.	+0.22		

θ Cephei			
20 ^h 27 ^m 54 ^s	+62° 39' 28".34		
1899 Oct. 12 H.	+1.2 I		
1904 Sept. 27 L.	+0.1 III		
29 L.	+0.3 III		
Mean.....	+0.53		
Corr.	+0.41		

ϵ Delphini			
20 ^h 28 ^m 26 ^s	+10° 57' 47".75		
1898 Sept. 29 H.	+0.1 I		
Oct. 9 H.	+0.8 I		
10 H.	+0.1 I		
11 H.	+0.3 I		
12 H.	+1.1 I		
13 H.	-0.1 I		
16 H.	+0.8 I		
19 H.	+0.4 I		
20 H.	+0.9 I		
24 H.	+0.6 I		
1904 May 15 L.	+0.1 III		
18 L.	+0.6 III		
Mean.....	+0.48		
Corr.	-0.28		

212 H ¹ . Draconis			
20 ^h 30 ^m 27 ^s	+72° 11' 34".28		
1903 Sept. 18 H.	-0.4 II		
19 H.	-1.5 II		
21 H.	-0.5 II		
1904 Nov. 1 L.	-0.4 III		
2 L.	-0.4 III		
1906 Nov. 1 L.	0.0 IV		
2 L.	+0.1 IV		
Mean.....	-0.44		
Corr.	+0.52		

212 H ¹ . Draconis S. P.			
20 ^h 30 ^m 27 ^s	+72° 11' 34".28		
1903 Mar. 17 E.	+1.8 II		
26 E.	+0.3 II		
1904 Nov. 1 L.	+1.2 III		
5 L.	-0.1 III		
1906 Nov. 4 L.	+1.4 IV		
5 L.	+0.8 IV		
Mean.....	+0.90		
Corr.	-0.83		

ζ Delphini			
20 ^h 30 ^m 38 ^s	+14° 19' 44".70		
1903 Sept. 14 H.	+1.3 II		
20 H.	+0.5 II		
Oct. 21 H.	+1.0 II		
Nov. 2 H.	+0.8 II		
1904 Aug. 11 L.	+0.3 III		
23 L.	+0.4 III		
1906 Sept. 5 L.	+0.2 IV		
Oct. 8 L.	+0.7 IV		
Mean.....	+0.65		
Corr.	-0.24		

73 Draconis			
20 ^h 32 ^m 50 ^s	+74° 36' 42".93		
1903 Sept. 22 H.	-0.8 II		
Oct. 12 H.	-0.9 II		
14 H.	-0.7 II		
1904 Oct. 28 L.	-0.1 III		
29 L.	+0.6 III		
Mean.....	-0.38		
Corr.	+0.55		

73 Draconis S. P.			
20 ^h 32 ^m 50 ^s	+74° 36' 42".93		
1904 Apr. 14 L.	+1.8 III		
16 L.	+0.8 III		
Oct. 28 L.	+0.7 III		
30 L.	+1.8 III		
Mean.....	+1.28		
Corr.	-0.81		

β Delphini			
20 ^h 32 ^m 52 ^s	+14° 14' 49".60		
1904 Aug. 17 L.	+0.3 III		
Sept. 15 L.	+0.3 III		
Mean.....	+0.30		
Corr.	-0.24		

29 Vulpeculæ			
20 ^h 34 ^m 3 ^s	+20° 51' 0".36		
1903 Sept. 15 H.	-0.4 II		
1904 Sept. 2 L.	-0.5 III		
7 L.	-0.2 III		
1906 Sept. 4 L.	-0.1 IV		
6 L.	+0.6 IV		
Mean.....	-0.12		
Corr.	-0.15		

13 G. Microscopii			
20 ^h 34 ^m 4 ^s	-33° 47' "		
1903 Nov. 3 H.	7.80 II		
1904 Aug. 15 L.	6.50 III		
24 L.	7.14 III		
1906 Sept. 7 L.	7.33 IV		
19 L.	6.98 IV		
Mean.....	-33 47 7.15		
Corr.	-0.66		

κ Delphini			
20 ^h 34 ^m 16 ^s	+9° 44' 2".33		
1904 Oct. 3 L.	+0.8 III		
6 L.	+0.1 III		
1906 Sept. 21 L.	+0.1 IV		
29 L.	0.0 IV		
Mean.....	+0.25		
Corr.	-0.29		

ν Capricorni			
20 ^h 34 ^m 21 ^s	-18° 29' 26".49		
1904 June 15 L.	-0.9 III		
20 L.	-0.1 III		
Mean.....	-0.50		
Corr.	-0.58		

75 Draconis			
20 ^h 34 ^m 32 ^s	+81° 4' "		
1903 Nov. 7 H.	49.68 II		
8 H.	49.24 II		
9 H.	49.16 II		
10 H.	49.26 II		
Mean.....	+81 4 49.34		
Corr.	+0.62		

75 Draconis S. P.			
20 ^h 34 ^m 32 ^s	+81° 4' "		
1903 Nov. 7 H.	49.71 II		
8 H.	50.20 II		
10 H.	49.66 II		
Mean.....	+81 4 49.86		
Corr.	-0.77		

α Delphini		
20 ^h 35 ^m 0 ^s	+15° 33' 33".64	
1904 May 22 L.	-1.4	III
24 L.	-0.7	III
Mean.....	-1.05	
Corr.	-0.22	

α Cygni		
20 ^h 38 ^m 1 ^s	+44° 55' 22".31	

1898 Feb.	23 H.	+0.1	I
	28 H.	+0.5	I
Mar.	5 H.	+0.3	I
	17 H.	+0.7	I
	31 H.	+1.4	I
Apr.	1 H.	+0.5	I
	2 H.	+0.2	I
June	6 H.	+0.7	I
Sept.	3 H.	+0.7	I
	5 H.	+1.4	I
	16 H.	+0.9	I
	17 H.	+0.4	I
	19 H.	-0.7	I
	23 H.	+1.2	I
	24 H.	+1.0	I
	27 H.	-0.7	I
	28 H.	-0.6	I
	29 H.	+0.7	I
	30 H.	+0.7	I
Oct.	9 H.	+0.8	I
	10 H.	+0.8	I
	11 H.	+1.1	I
	12 H.	+0.6	I
	13 H.	+1.0	I
	16 H.	[+2.0]	I
	19 H.	+1.2	I
	20 H.	+0.8	I
	24 H.	+0.7	I
	27 H.	+0.3	I
	31 H.	+0.9	I
Nov.	1 H.	+0.5	I
	6 H.	+0.6	I
	7 H.	+0.8	I
	11 H.	+0.4	I
	15 H.	+1.2	I
	20 H.	+0.1	I
	25 H.	+0.8	I
Dec.	1 H.	-0.2	I
	7 H.	+0.9	I
	9 H.	0.0	I
	10 H.	+0.3	I
	11 H.	-0.6	I
	13 H.	-0.2	I
	14 H.	+0.4	I
	15 H.	-0.2	I
	16 H.	0.0	I
	23 H.	+0.1	I
	29 H.	+1.6	I
1899 Jan.	19 H.	+0.6	I
	20 H.	-1.1	I
	21 H.	-0.6	I
	25 H.	-1.0	I
	27 H.	-0.6	I
	30 H.	+0.2	I
	31 H.	-1.0	I
Feb.	3 H.	+0.6	I
	22 H.	-0.8	I
	24 H.	-0.1	I
	28 H.	+0.1	I
Mar.	5 H.	-0.5	I
	15 H.	+0.6	I
	16 H.	+0.5	I
	19 H.	0.3	I
	23 H.	0.0	I
	31 H.	[-2.1]	I

1899 Apr.	9 H.	+0.7	I
	10 H.	+0.5	I
	12 H.	+0.2	I
	16 H.	-0.4	I
	17 H.	+0.7	I
	19 H.	+0.6	I
Apr.	20 H.	+1.0	I
	22 H.	+0.3	I
	23 H.	+1.3	I
	24 H.	+0.9	I
	26 H.	+1.1	I
	29 H.	+0.8	I
	30 H.	+0.5	I
May	9 H.	-0.2	I
	11 H.	-0.2	I
	13 H.	-1.1	I
	15 H.	+0.2	I
	24 H.	+0.3	I
June	3 H.	-1.2	I
	5 H.	-0.5	I
	7 H.	-0.7	I
	14 H.	-0.5	I
	16 H.	+1.0	I
	18 H.	-0.5	I
	22 H.	-0.1	I
	25 H.	-0.9	I
	29 H.	+1.2	I
July	1 H.	+0.1	I
	2 H.	+0.4	I
	9 H.	0.0	I
	10 H.	-0.4	I
	11 H.	+0.2	I
	18 H.	-0.4	I
	22 H.	-0.1	I
	31 H.	-0.4	I
Aug.	1 H.	+0.3	I
	2 H.	+0.7	I
	7 H.	-0.4	I
	8 H.	-1.0	I
	20 H.	+1.4	I
	22 H.	-0.6	I
	29 H.	-0.1	I
Sept.	1 H.	0.0	I
	11 H.	+0.2	I
	12 H.	+0.1	I
	13 H.	-0.7	I
	15 H.	-0.5	I
	24 H.	+1.2	I
	26 H.	-0.2	I
	27 H.	+0.2	I
	28 H.	0.0	I
	30 H.	-0.6	I
Oct.	3 H.	-0.1	I
	9 H.	-0.8	I
	12 H.	-0.5	I
	13 H.	-0.4	I
	14 H.	+1.2	I
	19 H.	+1.2	I
	20 H.	+1.4	I
	21 H.	-0.2	I
	24 H.	+0.5	I
	25 H.	+1.5	I
	26 H.	+1.5	I
Nov.	24 H.	+0.2	I
	27 H.	-0.5	I
Dec.	2 H.	-0.1	I
	4 H.	+0.3	I
	5 H.	-1.1	I
	6 H.	+0.1	I
	8 H.	-1.4	I
	9 H.	+0.8	I
	12 H.	[+2.2]	I
	13 H.	+0.4	I
1904 Nov.	14 L.	+0.2	III
	16 L.	+0.5	III
Mean.....		+0.23	
Corr.		+0.17	

δ Delphini		
20 ^h 38 ^m 47 ^s	+14° 42' 56".02	
1904 Sept.	16 L.	-0.2 III
	21 L.	+0.8 III
1906 Oct.	26 L.	+0.8 IV
Nov.	1 L.	+0.6 IV
Mean.....		+0.50
Corr.		-0.23

ϕ Capricorni		
20 ^h 40 ^m 11 ^s	-25° 37' 49".36	
1904 Oct.	11 L.	+0.7 III
	17 L.	-0.1 III
1906 Oct.	15 L.	+0.2 IV
	23 L.	+0.2 IV
Mean.....		+0.25
Corr.		-0.62

γ Delphini		
20 ^h 42 ^m 1 ^s	+15° 45' 48".59	
1904 Oct.	21 L.	+0.6 III
	22 L.	+0.6 III
1906 Oct.	29 L.	+1.2 IV
	30 L.	+0.3 IV
Mean.....		+0.68
Corr.		-0.22

ϵ Cygni		
20 ^h 42 ^m 10 ^s	+33° 35' 45".62	
1904 Nov.	1 L.	+0.3 III
	2 L.	+1.0 III
Mean.....		+0.65
Corr.		+0.02

ϵ Aquarii		
20 ^h 42 ^m 16 ^s	-9° 51' 42".94	
1904 Oct.	24 L.	+1.6 III
	27 L.	+0.6 III
Mean.....		+1.10
Corr.		-0.50

3 Aquarii		
20 ^h 42 ^m 28 ^s	-5° 23' 38".35	
1903 Sept.	18 H.	+0.7 II
	19 H.	+0.8 II
	21 H.	+0.2 II
	24 H.	+1.3 II
	30 H.	+1.2 II
1904 Aug.	23 L.	+0.8 III
Sept.	2 L.	+0.9 III
Mean.....		+0.84
Corr.		-0.46

6 H. Cephei		
20 ^h 42 ^m 52 ^s	+57° 13' 14".44	
1904 Sept.	23 L.	-1.8 III
	29 L.	-1.0 III
Mean.....		-1.40
Corr.		+0.34

7 Cephei		
20 ^h 43 ^m 15 ^s	+61° 27' 5".12	
1904 Oct.	28 L.	+0.4 III
	29 L.	0.0 III
Mean.....		+0.20
Corr.		+0.39

λ Cygni		
20 ^h 43 ^m 31 ^s	+36° 7' 23".08	
1904 Oct.	3 L.	-0.3 III
	6 L.	+0.3 III
1906 Sept.	18 L.	+0.4 IV
Oct.	6 L.	+0.6 IV
Mean.....		+0.25
Corr.		+0.05

ω Capricorni		
20 ^h 45 ^m 51 ^s	-27° 17' 35".74	
1903 Sept.	20 H.	+0.6 II
	22 H.	0.0 II
	26 H.	+0.6 II
Oct.	7 H.	+0.5 II
	14 H.	+0.1 II
1904 Sept.	7 L.	+0.9 III
	15 L.	+1.0 III
1906 Sept.	19 L.	+0.8 IV
	21 L.	+1.5 IV
Mean.....		+0.67
Corr.		-0.63

μ Aquarii		
20 ^h 47 ^m 16 ^s	-9° 21' 31".38	
1898 Oct.	28 H.	+1.2 I
1899 Oct.	14 H.	+0.8 I
1904 Sept.	16 L.	+1.3 III
	21 L.	+0.9 III
1906 Sept.	29 L.	+0.7 IV
Oct.	8 L.	+0.7 IV
Mean.....		+0.93
Corr.		-0.50

19 Capricorni		
20 ^h 49 ^m 9 ^s	-18° 18' "	
1903 Sept.	15 H.	6.94 II
	29 H.	6.96 II
Oct.	13 H.	7.25 II
	19 H.	6.95 II
	21 H.	6.43 II
Nov.	2 H.	6.51 II
1904 Oct.	14 L.	7.36 III
	17 L.	7.03 III
Mean.....		-18 18 6.93
Corr.		-0.57

76 Draconis		
20 ^h 49 ^m 51 ^s	+82° 9' 40".09	
1899 Oct.	19 H.	+0.5 I
	21 H.	+0.3 I
	24 H.	+0.4 I
1903 Nov.	3 H.	+0.5 II
1904 Nov.	1 L.	-0.4 III
	2 L.	0.0 III
1906 Nov.	1 L.	-0.6 IV
	2 L.	-0.4 IV
Mean.....		+0.04
Corr.		+0.63

76 Draconis s. p.		
20 ^h 49 ^m 51 ^s	+82° 9' 40".13	
1903 Mar.	12 E.	+0.7 II
	13 E.	-0.6 II
	31 E.	+0.2 II
1904 Apr.	16 L.	-0.3 III
	18 L.	+0.4 III
Nov.	1 L.	+0.4 III
	6 L.	0.0 III
1906 Nov.	4 L.	+0.9 IV
	5 L.	+0.6 IV
Mean.....		+0.26
Corr.		-0.77

β^2 Vulpeculae
20^h 50^m 18^s +27° 40' 37".90

1899 Oct. 26 H.	-0.3	I
1904 June 10 L.	-0.4	III
20 L.	-0.3	III
1906 Oct. 23 L.	+0.3	IV
26 L.	-0.2	IV
Mean.....	-0.18	
Corr.	-0.06	

γ Aquarii
20^h 51^m 30^s -10° 4' 51".55

1899 Oct. 12 H.	+1.1	I
1903 Nov. 6 H.	+1.2	II
1904 Sept. 27 L.	+1.3	III
29 L.	+0.9	III
Mean.....	+1.12	
Corr.	-0.51	

α^2 H¹. Draconis
20^h 52^m 8^s +80° 10' 38".58

1898 Sept. 16 H.	-1.0	I
Oct. 9 H.	-1.2	I
31 H.	+0.2	I
1904 Nov. 14 L.	-0.1	III
16 L.	-0.8	III
Mean.....	-0.58	
Corr.	+0.61	

α^2 H¹. Draconis s. p.
20^h 52^m 8^s +80° 10' 38".50

1903 Mar. 25 E.	+0.1	II
1904 Nov. 16 L.	-0.2	III
21 L.	0.0	III
Mean.....	-0.03	
Corr.	-0.78	

ν Cygni
20^h 53^m 27^s +40° 46' 55".09

1898 Oct. 27 H.	-1.7	I
Nov. 1 H.	-0.2	I
1904 May 24 L.	-0.5	III
June 15 L.	-0.5	III
1906 Nov. 3 L.	+0.1	IV
5 L.	+0.4	IV
Mean.....	-0.40	
Corr.	+0.12	

γ Microscopii
20^h 55^m 10^s -32° 38' 54".89

1903 Sept. 21 H.	+1.6	II
30 H.	+0.1	II
1904 Oct. 6 L.	0.0	III
11 L.	+0.6	III
1906 Oct. 6 L.	+0.5	IV
15 L.	+1.2	IV
Mean.....	+0.67	
Corr.	-0.66	

f^1 Cygni
20^h 56^m 26^s +47° 7' 49".48

1899 Sept. 30 H.	-0.1	I
1903 Sept. 24 H.	+0.2	II
1904 Sept. 7 L.	+0.1	III
15 L.	-0.6	III
Mean.....	-0.10	
Corr.	+0.20	

η Capricorni
20^h 58^m 43^s -20° 15' 2".32

1903 Sept. 18 H.	+1.3	II
20 H.	+1.5	II
22 H.	+0.7	II
Oct. 7 H.	+0.7	II
1904 Aug. 23 L.	+1.6	III
Sept. 2 L.	+1.5	III
1906 Sept. 21 L.	+1.7	IV
29 L.	+1.5	IV
Mean.....	+1.31	
Corr.	-0.59	

θ Capricorni
21^h 0^m 20^s -17° 37' 49".55

1903 Sept. 19 H.	-0.1	II
29 H.	+0.7	II
Oct. 13 H.	-0.2	II
21 H.	+1.8	II
1904 Sept. 21 L.	+1.6	III
23 L.	+1.9	III
1906 Oct. 8 L.	+1.1	IV
23 L.	+1.7	IV
Mean.....	+1.06	
Corr.	-0.57	

A Capricorni
21^h 1^m 17^s -25° 24' "

1903 Sept. 26 H.	19.17	II
Oct. 19 H.	19.70	II
20 H.	20.22	II
Nov. 3 H.	19.79	II
1904 Oct. 14 L.	19.05	III
17 L.	19.28	III
Mean.....	-25 24 19.54	
Corr.	-0.62	

ξ Cygni
21^h 1^m 18^s +43° 31' 43".91

1899 Oct. 14 H.	-0.6	I
1904 Oct. 27 L.	-1.3	III
28 L.	+0.7	III
Mean.....	-0.40	
Corr.	+0.15	

β^1 Cygni (*1st star*)
21^h 2^m 25^s +38° 15' 39".41

1899 Oct. 21 H.	+0.4	I
24 H.	-0.4	I
1904 Oct. 21 L.	+0.3	III
22 L.	-0.6	III
1906 Oct. 26 L.	-0.2	IV
Nov. 1 L.	0.0	IV
Mean.....	-0.08	
Corr.	+0.08	

f^2 Cygni
21^h 3^m 10^s +47° 14' 46".81

1899 Oct. 12 H.	+0.5	I
26 H.	+0.8	I
1904 Sept. 29 L.	+0.5	III
Oct. 3 L.	-0.2	III
Mean.....	+0.40	
Corr.	+0.20	

ν Aquarii
21^h 4^m 9^s -11° 46' 35".71

1899 Oct. 19 H.	-0.7	I
1904 June 10 L.	0.0	III
20 L.	-0.2	III
Mean.....	-0.30	
Corr.	-0.52	

γ Equulei
21^h 5^m 29^s +9° 43' 42".20

1899 Sept. 30 H.	+0.2	I
1903 Nov. 2 H.	+1.5	II
6 H.	+1.2	II
1904 Oct. 31 L.	+1.7	III
Nov. 11 L.	+1.1	III
Mean.....	+1.14	
Corr.	-0.29	

β^3 Piscis Australis
21^h 7^m 22^s -28° 1' 38".68

1903 Oct. 12 H.	+0.3	II
Nov. 10 H.	+0.5	II
1904 Oct. 6 L.	0.0	III
11 L.	+0.9	III
1906 Oct. 15 L.	+0.6	IV
29 L.	+0.7	IV
Mean.....	+0.50	
Corr.	-0.64	

α^8 B. Cephei
21^h 7^m 30^s +77° 43' 15".16

1903 Sept. 24 H.	-0.8	II
Nov. 7 H.	+1.1	II
8 H.	-0.7	II
9 H.	-0.8	II
1904 Nov. 7 L.	-0.3	III
14 L.	+0.4	III
Mean.....	-0.18	
Corr.	+0.59	

α^8 B. Cephei s. p.
21^h 7^m 30^s +77° 43' 15".16

1903 Mar. 26 E.	+2.8	II
31 E.	+1.4	II
Apr. 1 E.	+1.6	II
6 E.	+1.2	II
1904 Nov. 6 L.	+0.1	III
16 L.	+1.8	III
21 L.	+0.9	III
Mean.....	+1.40	
Corr.	-0.80	

ζ Cygni
21^h 8^m 41^s +29° 48' 59".73

1898 Oct. 9 H.	+1.5	I
27 H.	+0.4	I
28 H.	+0.5	I
31 H.	+0.3	I
1904 Nov. 16 L.	+0.7	III
21 L.	+0.4	III
Mean.....	+0.63	
Corr.	-0.03	

G Cephei
21^h 9^m 16^s +59° 34' 31".53

1904 Sept. 2 L.	-1.5	III
15 L.	-1.1	III
1906 Sept. 21 L.	-0.4	IV
29 L.	-0.4	IV
Mean.....	-0.85	
Corr.	+0.37	

τ Cygni
21^h 10^m 48^s +37° 37' 7".58

1898 Nov. 1 H.	+0.5	I
1904 Oct. 27 L.	0.0	III
28 L.	+0.4	III
Mean.....	+0.30	
Corr.	+0.07	

α Equulei
21^h 10^m 50^s +4° 50' 3".23

1899 Oct. 14 H.	-1.3	I
21 H.	-0.7	I
1904 Oct. 14 L.	0.0	III
17 L.	+0.1	III
1906 Oct. 6 L.	-0.3	IV
8 L.	-0.2	IV
Mean.....	-0.40	
Corr.	-0.35	

β^4 Piscis Australis
21^h 11^m 53^s -32° 35' 25".32

1903 Sept. 19 H.	0.0	II
22 H.	-0.7	II
29 H.	+1.6	II
Oct. 13 H.	0.0	II
19 H.	-0.2	II
1904 Sept. 21 L.	-0.1	III
23 L.	+1.0	III
1906 Oct. 23 L.	+1.7	IV
26 L.	+1.8	IV
Mean.....	+0.57	
Corr.	-0.66	

α Cygni
21^h 13^m 29^s +38° 58' 32".04

1904 Oct. 21 L.	-0.9	III
22 L.	-0.1	III
1906 Oct. 30 L.	0.0	IV
Nov. 1 L.	-0.2	IV
2 L.	-0.3	IV
Mean.....	-0.30	
Corr.	+0.09	

ν Cygni
21^h 13^m 48^s +34° 28' 35".85

1899 Oct. 19 H.	+1.0	I
26 H.	+1.4	I
1904 Sept. 29 L.	+1.1	III
Oct. 3 L.	+1.6	III
1906 Nov. 4 L.	+1.6	IV
5 L.	+0.6	IV
Mean.....	+1.22	
Corr.	+0.03	

α Cephei
21^h 16^m 12^s +62° 9' 42".61

1898 Oct. 27 H.	-0.4	I
1899 Oct. 24 H.	+0.3	I
1904 Nov. 21 L.	-0.3	III
23 L.	-0.4	III
Mean.....	-0.20	
Corr.	+0.40	

ϵ Capricorni
21^h 16^m 41^s -17° 15' 37".68

1903 Sept. 18 H.	+0.4	II
26 H.	+0.7	II
30 H.	+0.7	II
Oct. 7 H.	+1.0	II
20 H.	+1.1	II
1904 Oct. 31 L.	+1.5	III
Nov. 11 L.	+1.7	III
Mean.....	+1.01	
Corr.	-0.57	

α Pegasi
21^h 17^m 28^s +19° 22' 35".82

1899 Sept. 30 H.	-0.6	I
1904 Nov. 17 L.	+0.3	III
19 L.	0.0	III
Mean.....	-0.10	
Corr.	-0.17	

B. A. C. 7504
21^h 19^m 35^s +86° 37' 24".97

1903 Oct. 14 H.	-0.9	II
21 H.	-1.0	II
Nov. 2 H.	0.0	II
3 H.	-0.7	II
6 H.	-0.3	II
1904 Nov. 14 L.	+0.4	III
16 L.	+0.1	III
Mean.....	-0.34	
Corr.	+0.67	

B. A. C. 7504 S. P.
21^h 19^m 35^s +86° 37' 24".96

1903 Mar. 18 E.	+0.2	II
26 E.	+0.8	II
Apr. 10 E.	+1.3	II
18 E.	+1.0	II
1904 Nov. 16 L.	+0.3	III
21 L.	+0.4	III
Mean.....	+0.67	
Corr.	-0.73	

ζ Capricorni
21^h 20^m 58^s -22° 50' 40".11

1898 Oct. 31 H.	+1.2	I
1904 Oct. 17 L.	+0.5	III
21 L.	+0.3	III
Mean.....	+0.67	
Corr.	-0.61	

θ Cygni
21^h 21^m 42^s +36° 14' 6".56

1899 Oct. 20 H.	+0.2	I
1904 Oct. 6 L.	+0.5	III
14 L.	+0.8	III
1906 Sept. 29 L.	+0.7	IV
Oct. 6 L.	+1.2	IV
Mean.....	+0.68	
Corr.	+0.05	

δ Capricorni
21^h 23^m 1^s -22° 14' 34".35

1903 Sept. 29 H.	+1.7	II
Oct. 12 H.	+1.6	II
13 H.	+2.1	II
19 H.	+1.7	II
Nov. 8 H.	+1.9	II
1904 Sept. 15 L.	+1.6	III
Oct. 3 L.	+1.3	III
1906 Oct. 8 L.	+2.0	IV
15 L.	+1.7	IV
Mean.....	+1.73	
Corr.	-0.60	

η Cygni
21^h 25^m 46^s +46° 5' 59".19

1904 Sept. 29 L.	-0.4	III
Oct. 27 L.	-0.8	III
1906 Oct. 23 L.	+0.3	IV
26 L.	+0.2	IV
Mean.....	-0.18	
Corr.	+0.19	

β Aquarii
21^h 26^m 18^s -6° 0' 40".34

1898 Oct. 9 H.	+0.4	I
Nov. 1 H.	+0.2	I
1904 Oct. 22 L.	+1.3	III
Nov. 30 L.	+0.8	III
Mean.....	+0.68	
Corr.	-0.47	

β Cephei
21^h 27^m 22^s +70° 7' 18".08

1899 Sept. 30 H.	-0.3	I
1903 Oct. 7 H.	-0.3	II
20 H.	-1.1	II
Nov. 12 H.	-1.0	II
1904 Nov. 7 L.	-0.4	III
14 L.	+0.6	III
Mean.....	-0.42	
Corr.	+0.50	

β Cephei S. P.
21^h 27^m 22^s +70° 7' 18".08

1903 Mar. 12 E.	+0.7	II
Apr. 4 E.	+0.4	II
1904 Nov. 6 L.	-0.4	III
16 L.	+0.5	III
Mean.....	+0.30	
Corr.	-0.84	

γ B. Cygni
21^h 28^m 6^s +52° 10' " "

1899 Oct. 21 H.	41.85	I
1903 Sept. 26 H.	41.79	II
30 H.	41.81	II
Oct. 21 H.	41.05	II
Nov. 3 H.	41.80	II
1904 Nov. 17 L.	41.31	III
19 L.	41.64	III
1906 Oct. 29 L.	41.88	IV
Nov. 1 L.	42.29	IV
Mean.....	+52.10	41.71
Corr.	+0.27	

ρ Cygni
21^h 30^m 13^s +45° 8' 58".49

1899 Oct. 19 H.	-0.1	I
1904 Nov. 11 L.	+0.4	III
16 L.	+0.1	III
Mean.....	+0.13	
Corr.	+0.18	

γ Cygni
21^h 30^m 41^s +38° 5' 8".71

1904 Oct. 28 L.	0.0	III
31 L.	+0.9	III
Mean.....	+0.45	
Corr.	+0.08	

ξ Aquarii
21^h 32^m 26^s -8° 18' 9".95

1898 Oct. 28 H.	+2.3	I
1904 Oct. 17 L.	+0.9	III
21 L.	+0.5	III
1906 Sept. 29 L.	+0.3	IV
Oct. 6 L.	0.0	IV
8 L.	+0.5	IV
Mean.....	+0.75	
Corr.	-0.49	

γ Cygni
21^h 32^m 56^s +39° 57' 51".07

1899 Oct. 20 H.	-0.8	I
24 H.	+0.2	I
1904 Oct. 6 L.	-1.0	III
14 L.	+0.2	III
Mean.....	-0.35	
Corr.	+0.10	

γ Capricorni
21^h 34^m 33^s -17° 6' 50".52

1904 June 10 L.	+0.2	III
20 L.	-0.1	III
Mean.....	+0.05	
Corr.	-0.57	

γ H. Cephei
21^h 35^m 51^s +57° 2' 12".78

1904 Sept. 15 L.	-1.3	III
Oct. 3 L.	-1.4	III
1906 Oct. 15 L.	-1.2	IV
23 L.	-1.0	IV
Mean.....	-1.22	
Corr.	+0.34	

γ Capricorni
21^h 36^m 19^s -23° 42' " "

1903 Sept. 29 H.	54.38	II
Oct. 12 H.	53.77	II
13 H.	52.72	II
19 H.	53.71	II
Nov. 2 H.	53.20	II
1904 Oct. 22 L.	54.57	III
27 L.	54.96	III
Mean.....	-23.42	53.90
Corr.	-0.61	

κ Capricorni
21^h 37^m 5^s -19° 19' 19".65

1904 Nov. 26 L.	+0.7	III
1905 Dec. 1 L.	+0.4	III
1906 Nov. 6 L.	+1.0	IV
7 L.	+0.8	IV
Mean.....	+0.72	
Corr.	-0.58	

ι Piscis Australis
21^h 38^m 59^s -33° 28' 55".09

1903 Oct. 14 H.	-0.7	II
20 H.	-0.1	II
Nov. 4 H.	-0.1	II
6 H.	-0.5	II
8 H.	+0.9	II
1904 Nov. 19 L.	-0.3	III
30 L.	-0.5	III
1906 Oct. 26 L.	+0.5	IV
29 L.	+0.2	IV
Mean.....	-0.07	
Corr.	-0.66	

ι Pegasi
21^h 39^m 16^s +9° 24' 59".10

1904 Dec. 1 L.	+0.1	III
6 L.	+1.1	III
Mean.....	+0.60	
Corr.	-0.30	

κ Pegasi
21^h 40^m 7^s +23° 11' 7".12

1899 Oct. 21 H.	-0.2	I
1904 Sept. 29 L.	-0.4	III
Oct. 28 L.	+0.3	III
1906 Nov. 1 L.	-0.1	IV
2 L.	+0.2	IV
Mean.....	-0.04	
Corr.	-0.10	

ι Cephei
21^h 40^m 27^s +70° 51' 3".60

1899 Oct. 19 H.	-0.8	I
1903 Sept. 30 H.	-1.3	II
Oct. 7 H.	-1.1	II
Nov. 3 H.	-1.5	II
7 H.	+0.5	II
1904 Nov. 16 L.	-0.7	III
28 L.	-0.5	III
Mean.....	-0.77	
Corr.	+0.51	

ι Cephei S. P.
21^h 40^m 27^s +70° 51' 3".67

1903 Apr. 21 E.	+0.2	II
1904 Nov. 16 L.	+1.1	III
30 L.	+0.4	III
Mean.....	+0.57	
Corr.	-0.83	

λ Capricorni
21^h 41^m 9^s -11° 49' 37".77

1904 Oct. 31 L.	+1.3	III
Nov. 7 L.	+0.3	III
Mean.....	+0.80	
Corr.	-0.52	

δ Capricorni
21^h 41^m 31^s -16° 34' 53".81

1905 Dec. 4 L.	+2.2	III
5 L.	+1.4	III
Mean.....	+1.80	
Corr.	-0.56	

ν Cephei
21^h 42^m 34^s +60° 39' 33".45

1899 Oct. 24 H.	-0.9	I
1903 Oct. 21 H.	[-3.5]	II
Nov. 9 H.	-1.8	II
10 H.	-1.2	II
12 H.	-1.1	II
14 H.	-1.7	II
1904 Nov. 11 L.	-0.7	III
17 L.	-1.2	III
1906 Nov. 9 L.	-0.4	IV
10 L.	-0.3	IV
Mean.....	-1.03	
Corr.	+0.38	

π Cygni
21^h 43^m 6^s +48° 50' 48".41

1904 Dec. 8 L.	-0.5	III
13 L.	-0.3	III
1906 Nov. 5 L.	-0.7	IV
8 L.	+0.3	IV
Mean.....	-0.30	
Corr.	+0.23	

14 Pegasi			134 G. Capricorni			ν Pegasi			θ Pegasi		
21 ^h 45 ^m 25 ^s	+29° 42' 30".76		21 ^h 53 ^m 9 ^s	-21° 39' "		22 ^h 0 ^m 38 ^s	+4° 34' 11".38		22 ^h 5 ^m 9 ^s	+5° 42' 21".22	
1904 Oct. 14 L.	-0.8 III		1903 Oct. 20 H.	35.84 II		1899 Oct. 21 H.	+1.3 I		1904 Dec. 12 L.	-0.5 III	
17 L.	+0.3 III		21 H.	37.37 II		1903 Oct. 19 H.	+1.0 II		13 L.	+0.1 III	
1906 Oct. 6 L.	-0.1 IV		Nov. 6 H.	35.58 II		Nov. 2 H.	-0.2 II		Mean.....	-0.20	
8 L.	-1.1 IV		1904 Nov. 19 L.	36.02 III		8 H.	+0.9 II		Corr.	-0.34	
Mean.....	-0.42		30 L.	35.93 III		1904 Oct. 28 L.	+0.7 III				
Corr.	-0.04		Mean.....	-21 39 36.15		31 L.	+1.1 III				
			Corr.	-0.60		1905 Dec. 5 L.	+0.3 III				
						Mean.....	+0.73				
						Corr.	-0.36				
μ Capricorni			η Piscis Australis			α Aquarii			π Pegasi		
21 ^h 47 ^m 51 ^s	-14° 1' 21".49		21 ^h 55 ^m 6 ^s	-28° 56' 0".64		22 ^h 0 ^m 39 ^s	-0° 48' 20".51		22 ^h 5 ^m 33 ^s	+32° 41' 14".69	
1898 Oct. 27 H.	+1.5 I		1903 Nov. 9 H.	+0.4 II		1898 Oct. 27 H.	+1.5 I		1898 Nov. 11 H.	-0.8 I	
1904 Oct. 3 L.	+1.0 III		1904 Nov. 11 L.	+1.2 III		28 H.	+0.4 I		1904 Nov. 28 L.	+1.1 III	
6 L.	+1.4 III		16 L.	+1.1 III		31 H.	+0.5 I		Dec. 6 L.	0.0 III	
1906 Oct. 15 L.	+1.6 IV		26 L.	+1.5 IV		Nov. 1 H.	+1.0 I		Mean.....	+0.10	
23 L.	+1.5 IV		29 L.	+0.8 IV		7 H.	+0.8 I		Corr.	0.00	
Mean.....	+1.40		Mean.....	+1.00		1904 June 10 L.	-0.2 III				
Corr.	-0.54		Corr.	-0.64		20 L.	+0.1 III				
						1906 Nov. 3 L.	-0.4 IV				
						12 L.	-0.2 IV				
						Mean.....	+0.39				
						Corr.	-0.41				
16 Pegasi			28 Aquarii			ε Aquarii			28 Pegasi		
21 ^h 48 ^m 31 ^s	+25° 27' 16".60		21 ^h 55 ^m 58 ^s	+0° 7' 29".21		22 ^h 1 ^m 2 ^s	-14° 21' 17".88		22 ^h 5 ^m 47 ^s	+20° 29' 10".93	
1898 Oct. 31 H.	-0.4 I		1899 Oct. 19 H.	-0.5 I		1904 Oct. 11 L.	+1.1 III		1903 Oct. 14 H.	+0.6 II	
1904 June 10 L.	-0.8 III		1903 Nov. 12 H.	+1.2 II		Nov. 2 L.	+1.2 III		21 H.	+1.2 II	
20 L.	-0.4 III		1904 Oct. 14 L.	-1.2 III		Mean.....	+0.39		Nov. 3 H.	+1.2 II	
1906 Nov. 6 L.	+0.1 IV		17 L.	+0.2 III		Corr.	-0.41		9 H.	+0.3 II	
7 L.	-0.1 IV		1906 Oct. 8 L.	-0.7 IV					14 H.	+0.7 II	
Mean.....	-0.32		Nov. 1 L.	-0.6 IV					1904 Nov. 11 L.	+0.5 III	
Corr.	-0.09		Mean.....	-0.27					16 L.	+0.4 III	
			Corr.	-0.40					1906 Oct. 26 L.	+1.7 IV	
									29 L.	+1.3 IV	
									Mean.....	+0.89	
									Corr.	-0.16	
Bradley 2868			20 Pegasi			20 Cephei			ζ Cephei		
21 ^h 49 ^m 45 ^s	+55° 44' 27".99		21 ^h 56 ^m 13 ^s	+12° 38' 26".61		22 ^h 1 ^m 58 ^s	+62° 17' 51".80		22 ^h 7 ^m 23 ^s	+57° 42' 29".84	
1899 Oct. 21 H.	-1.0 I		1899 Oct. 24 H.	-0.3 I		1904 Oct. 21 L.	-0.4 III		1899 Oct. 19 H.	-1.0 I	
1903 Oct. 19 H.	-0.2 II		1904 Nov. 17 L.	+0.4 III		22 L.	-0.8 III		1904 June 10 L.	-1.3 III	
Nov. 2 H.	-1.6 II		Dec. 1 L.	-0.2 III		Mean.....	-0.60		20 L.	-0.5 III	
8 H.	-0.8 II		1906 Nov. 8 L.	+0.6 IV		Corr.	+0.54		Mean.....	-0.93	
1904 Oct. 22 L.	-0.1 III		10 L.	+0.5 IV					Corr.	+0.34	
28 L.	-0.3 III		Mean.....	+0.20							
Mean.....	-0.67		Corr.	-0.26							
Corr.	+0.32										
13 Cephei			16 Cephei			ε Pegasi			24 Cephei		
21 ^h 51 ^m 32 ^s	+56° 8' 14".98		21 ^h 57 ^m 49 ^s	+72° 42' 12".58		22 ^h 2 ^m 21 ^s	+24° 51' 23".82		22 ^h 7 ^m 53 ^s	+71° 50' 54".65	
1899 Oct. 20 H.	+1.4 I		1904 Nov. 14 L.	+1.3 III		1904 Nov. 7 L.	0.0 III		1903 Oct. 20 H.	-0.6 II	
1903 Oct. 12 H.	+0.8 II		21 L.	+0.4 III		26 L.	-0.6 III		Nov. 6 H.	-0.8 II	
Nov. 3 H.	+0.1 II		1906 Nov. 16 L.	+0.2 IV		1906 Oct. 6 L.	+0.9 IV		12 H.	-0.5 II	
7 H.	+1.4 II		21 L.	+0.1 IV		15 L.	-0.1 IV		1904 Nov. 17 L.	-0.4 III	
14 H.	-0.7 II		Mean.....	+0.50		Mean.....	+0.05		21 L.	-0.4 III	
1904 Sept. 29 L.	+0.2 III		Corr.	+0.53		Corr.	-0.10		1906 Nov. 21 L.	-0.6 IV	
Oct. 21 L.	-0.5 III								22 L.	-0.5 IV	
Mean.....	+0.39								Mean.....	-0.54	
Corr.	+0.32								Corr.	+0.52	
158 B. Cephei			16 Cephei s. p.			μ Piscis Australis			24 Cephei s. p.		
21 ^h 51 ^m 37 ^s	+73° 13' 45".00		21 ^h 57 ^m 49 ^s	+72° 42' 12".75		22 ^h 2 ^m 33 ^s	-33° 28' "		22 ^h 7 ^m 53 ^s	+71° 50' 54".05	
1898 Oct. 28 H.	0.0 I		1903 Mar. 25 E.	+1.8 II		1903 Oct. 13 H.	36.31 II		1903 Apr. 21 E.	+2.0 II	
1903 Oct. 13 H.	-0.5 II		Apr. 29 E.	-0.1 II		Nov. 4 H.	34.08 II		28 E.	+1.8 II	
14 H.	-0.9 II		1904 May 2 L.	+1.8 III		1904 Nov. 30 L.	34.28 III		29 E.	0.0 II	
Nov. 4 H.	-0.5 II		4 L.	+2.4 III		Dec. 8 L.	34.48 III		May 1 E.	+1.3 II	
1904 Nov. 23 L.	+0.1 III		Nov. 16 L.	+1.7 III		Mean.....	-33 28 35.01		May 2 L.	+0.9 III	
28 L.	-0.2 III		21 L.	+2.1 III		Corr.	-0.66		4 L.	+0.0 III	
Mean.....	-0.33		1906 Nov. 16 L.	+0.9 IV					Nov. 16 L.	+1.7 III	
Corr.	+0.54		29 L.	+0.8 IV					21 L.	+0.3 III	
			Mean.....	+1.42					1906 Nov. 16 L.	+0.6 IV	
			Corr.	-0.82					22 L.	+1.6 IV	
									Mean.....	+1.11	
									Corr.	-0.83	
158 B. Cephei s. p.			0 Aquarii			27 Pegasi					
21 ^h 51 ^m 37 ^s	+73° 13' 45".02		21 ^h 58 ^m 9 ^s	-2° 38' 17".12		22 ^h 4 ^m 48 ^s	+32° 41' 0".72				
1903 Apr. 18 E.	+1.8 II		1903 Nov. 10 H.	+0.4 II		1904 Nov. 19 L.	+0.5 III				
27 E.	+1.2 II		1904 Oct. 3 L.	-0.1 III		23 L.	+0.5 III				
1904 Nov. 23 L.	+1.1 III		6 L.	-0.5 III		Mean.....	+0.50				
1905 Apr. 9 L.	+1.7 III		1906 Nov. 6 L.	0.0 IV		Corr.	0.00				
Mean.....	+1.45		7 L.	-0.1 IV							
Corr.	-0.82		Mean.....	-0.06							
			Corr.	-0.43							

λ Cephei			
22 ^h 8 ^m 7 ^s	+58° 55'	"	
1903 Nov. 10 H.	15.57	II	
1904 Oct. 14 L.	15.98	III	
17 L.	15.43	III	
1906 Oct. 8 L.	15.74	IV	
Nov. 1 L.	15.41	IV	
Mean.....	+58 55	15.63	
Corr.		+0.36	

λ Piscis Australis			
22 ^h 8 ^m 39 ^s	-28° 15'	"	
1904 Oct. 3 L.	44.87	III	
6 L.	44.60	III	
1906 Nov. 6 L.	45.05	IV	
7 L.	44.11	IV	
Mean.....	-28 15	44.66	
Corr.		-0.64	

γ H. Lacertæ*			
22 ^h 9 ^m 35 ^s	+39° 13'	7".18	
1905 Dec. 1 L.	+1.2	III	
4 L.	+0.3	III	
1906 Nov. 8 L.	+0.7	IV	
10 L.	+0.1	IV	
Mean.....		+0.58	
Corr.		+0.09	

θ Aquarii			
22 ^h 11 ^m 33 ^s	-8° 16'	52".51	
1898 Oct. 28 H.	+0.4	I	
31 H.	-0.5	I	
Nov. 7 H.	+1.0	I	
20 H.	+0.6	I	
1904 Oct. 11 L.	+0.8	III	
Nov. 2 L.	+0.7	III	
1905 Dec. 5 L.	+1.1	III	
1906 Nov. 13 L.	+0.9	IV	
16 L.	+1.1	IV	
Mean.....		+0.68	
Corr.		-0.49	

ρ Aquarii			
22 ^h 14 ^m 56 ^s	-8° 19'	24".35	
1903 Oct. 13 H.	+1.0	II	
19 H.	+1.7	II	
Nov. 4 H.	+1.3	II	
7 H.	+0.7	II	
14 H.	+1.9	II	
1904 Oct. 21 L.	+1.2	III	
22 L.	+1.2	III	
Mean.....		+1.29	
Corr.		-0.49	

47 Aquarii			
22 ^h 16 ^m 5 ^s	-22° 5'	"	
1903 Oct. 14 H.	57.90	II	
21 H.	58.00	II	
Nov. 8 H.	57.67	II	
1904 Oct. 28 L.	56.72	III	
31 L.	56.44	III	
Mean.....	-22 5	57.35	
Corr.		-0.60	

γ Aquarii			
22 ^h 16 ^m 29 ^s	-1° 53'	28".35	
1898 Oct. 27 H.	+1.0	I	
Nov. 1 H.	+0.5	I	
1904 Sept. 29 L.	+0.1	III	
Nov. 7 L.	+0.2	III	
Mean.....		+0.45	
Corr.		-0.43	

31 Pegasi			
22 ^h 16 ^m 36 ^s	+11° 42'	4".46	
1899 Oct. 24 H.	-0.6	I	
1903 Nov. 9 H.	+0.9	II	
1904 Nov. 11 L.	+1.3	III	
16 L.	+0.5	III	
Mean.....		+0.52	
Corr.		-0.27	

32 Pegasi			
22 ^h 16 ^m 42 ^s	+27° 49'	"	
1904 Nov. 19 L.	36.87	III	
Dec. 6 L.	37.22	III	
Mean.....	+27 49	37.04	
Corr.		-0.06	

2 Lacertæ			
22 ^h 16 ^m 54 ^s	+46° 1'	"	
1904 June 20 L.	59.10	III	
Nov. 17 L.	58.70	III	
1906 Oct. 15 L.	58.09	IV	
26 L.	58.08	IV	
Mean.....	+46 1	58.49	
Corr.		+0.19	

3 Lacertæ			
22 ^h 19 ^m 38 ^s	+51° 43'	39".65	
1904 Oct. 14 L.	-0.2	III	
17 L.	-0.4	III	
1906 Oct. 29 L.	-0.6	IV	
Nov. 7 L.	+0.5	IV	
Mean.....		-0.18	
Corr.		+0.27	

π Aquarii			
22 ^h 20 ^m 10 ^s	+0° 52'	11".48	
1898 Nov. 20 H.	-0.3	I	
1905 Dec. 1 L.	+0.2	III	
4 L.	-0.1	III	
1906 Nov. 1 L.	+0.2	IV	
6 L.	+0.2	IV	
Mean.....		+0.04	
Corr.		-0.40	

32 H. Cephei			
22 ^h 21 ^m 18 ^s	+85° 36'	"	
1903 Oct. 31 H.	16.53	II	
Nov. 10 H.	16.64	II	
1904 Dec. 8 L.	16.75	III	
12 L.	16.22	III	
1906 Nov. 29 L.	17.30	IV	
Dec. 2 L.	17.21	IV	
Mean.....	+85 36	16.74	
Corr.		+0.67	

32 H. Cephei s. p.			
22 ^h 21 ^m 18 ^s	+85° 36'	"	
1903 Apr. 28 E.	19.48	II	
May 1 E.	19.53	II	
1904 Dec. 6 L.	17.73	III	
13 L.	19.20	III	
1906 Nov. 29 L.	18.45	IV	
Dec. 3 L.	17.92	IV	
Mean.....	+85 36	18.72	
Corr.		-0.74	

ζ Aquarii (mean)†			
22 ^h 23 ^m 41 ^s	-0° 31'	56".49	
1903 Nov. 6 H.	+4.0	II	
1905 Dec. 5 L.	+2.9	III	
6 L.	+2.6	III	
Mean.....		+3.17	
Corr.		-0.41	

σ Aquarii			
22 ^h 25 ^m 21 ^s	-11° 11'	22".99	
1904 Dec. 1 L.	+0.7	III	
13 L.	+0.7	III	
1906 Nov. 8 L.	+0.9	IV	
10 L.	+0.5	IV	
Mean.....		+0.70	
Corr.		-0.52	

38 Pegasi			
22 ^h 25 ^m 27 ^s	+32° 3'	38".29	
1905 Dec. 7 L.	-0.2	III	
11 L.	+0.3	III	
1906 Nov. 13 L.	0.0	IV	
16 L.	+0.3	IV	
Mean.....		+0.10	
Corr.		0.00	

δ Cephei			
22 ^h 25 ^m 27 ^s	+57° 54'	11".83	
1904 Nov. 17 L.	-0.2	III	
19 L.	+0.1	III	
Mean.....		-0.05	
Corr.		+0.35	

β Piscis Australis			
22 ^h 25 ^m 49 ^s	-32° 51'	"	
1903 Oct. 13 H.	31.10	II	
Nov. 4 H.	32.28	II	
1904 Oct. 21 L.	31.48	III	
22 L.	31.64	III	
Mean.....	-32 51	31.62	
Corr.		-0.66	

7 Lacertæ			
22 ^h 27 ^m 10 ^s	+49° 46'	5".84	
1898 Nov. 1 H.	+1.1	I	
11 H.	-0.5	I	
1904 June 20 L.	-0.1	III	
Oct. 11 L.	0.0	III	
Nov. 16 L.	+0.1	III	
1906 Nov. 22 L.	0.0	IV	
26 L.	-0.1	IV	
Mean.....		+0.07	
Corr.		+0.24	

ν Aquarii			
22 ^h 29 ^m 13 ^s	-21° 13'	14".86	
1903 Oct. 14 H.	+1.8	II	
21 H.	+1.8	II	
Nov. 7 H.	+1.0	II	
9 H.	+1.9	II	
14 H.	+2.7	II	
1904 Oct. 14 L.	+1.1	III	
17 L.	+1.2	III	
1906 Oct. 26 L.	+1.1	IV	
Nov. 1 L.	+1.1	IV	
Mean.....		+1.52	
Corr.		-0.59	

η Aquarii			
22 ^h 30 ^m 13 ^s	-0° 37'	58".68	
1898 Oct. 28 H.	+0.7	I	
31 H.	-0.5	I	
Nov. 7 H.	+0.8	I	
1904 Nov. 2 L.	+0.3	III	
7 L.	-0.6	III	
Mean.....		+0.14	
Corr.		-0.41	

226 B. Cephei			
22 ^h 30 ^m 31 ^s	+75° 42'	39".79	
1898 Oct. 27 H.	-1.1	I	
Nov. 20 H.	-1.8	I	
1903 Nov. 3 H.	-1.2	II	
1904 Nov. 28 L.	-0.8	III	
Dec. 12 L.	-0.8	III	
Mean.....		-1.14	
Corr.		+0.56	

226 B. Cephei s. p.			
22 ^h 30 ^m 31 ^s	+75° 42'	39".79	
1903 Apr. 27 E.	+1.4	II	
May 4 E.	+1.6	II	
1904 Dec. 6 L.	+0.8	III	
13 L.	+1.8	III	
Mean.....		+1.40	
Corr.		-0.81	

κ Aquarii			
22 ^h 32 ^m 35 ^s	-4° 44'	38".39	
1903 Oct. 20 H.	+1.2	II	
31 H.	+0.9	II	
Nov. 12 H.	+1.5	II	
1904 Oct. 28 L.	+1.3	III	
31 L.	+0.7	III	
Mean.....		+1.12	
Corr.		-0.46	

40 G. Piscis Australis			
22 ^h 33 ^m 13 ^s	-33° 30'	"	
1903 Nov. 10 H.	6.08	II	
1904 Nov. 30 L.	4.56	III	
1905 Dec. 1 L.	4.87	III	
1906 Nov. 6 L.	5.85	IV	
7 L.	4.67	IV	
Mean.....	-33 36	5.21	
Corr.		-0.66	

31 Cephei			
22 ^h 33 ^m 18 ^s	+75° 7'	26".64	
1904 Dec. 14 L.	-0.6	III	
16 L.	-0.6	III	
Mean.....		-0.60	
Corr.		+0.53	

*The declination for 1900 in *NRWCOMB's* Catalogue requires a correction of +0".71, and the proper motion requires a correction of +2".42. These corrections have been applied.
†The position in *NRWCOMB's* Catalogue is for the south following component.

<p>31 Cephei s. P. 22^h 33^m 18^s +73° 7' 26".64</p> <p>1904 Dec. 15 L. +0.5 III 17 L. +0.9 III</p> <p>Mean..... +0.70 Corr. -0.82</p>	<p>λ Pegasi 22^h 41^m 43^s +23° 2' 21".61</p> <p>1898 Oct. 31 H. -0.4 I Nov. 7 H. +0.4 I 1904 Nov. 7 L. 0.0 III 11 L. +0.7 III</p> <p>Mean..... +0.18 Corr. -0.13</p>	<p>δ Aquarii 22^h 49^m 21^s -16° 21' 9".75</p> <p>1905 Dec. 1 L. +1.9 III 4 L. +1.7 III 1906 Nov. 21 L. +1.2 IV 22 L. +1.8 IV</p> <p>Mean..... +1.65 Corr. -0.56</p>	<p>ο Andromedæ 22^h 57^m 19^s +41° 47' 18".50</p> <p>1898 Nov. 15 H. -0.9 I 1904 Dec. 13 L. +0.4 III 1905 Dec. 5 L. +0.2 III</p> <p>Mean..... -0.10 Corr. +0.13</p>
<p>10 Lacertæ 22^h 34^m 46^s +38° 31' 46".88</p> <p>1904 Dec. 8 L. +0.1 III 13 L. -0.2 III</p> <p>Mean..... -0.05 Corr. +0.08</p>	<p>τ Aquarii 22^h 44^m 18^s -14° 7' 13".63</p> <p>1904 Oct. 31 L. +0.9 III Nov. 2 L. +0.4 III 1906 Oct. 26 L. +1.1 IV Nov. 1 L. +0.8 IV</p> <p>Mean..... +0.80 Corr. -0.54</p>	<p>94 H¹. Aquarii 22^h 50^m 0^s -5° 31' "</p> <p>1903 Oct. 14 H. 14.01 II 21 H. 14.17 II Nov. 2 H. 13.85 II 7 H. 14.02 II 14 H. 12.99 II 1904 Nov. 16 L. 14.11 III 17 L. 13.18 III 1906 Nov. 8 L. 13.19 IV 10 L. 13.37 IV</p> <p>Mean..... -5 31 13.65 Corr. -0.46</p>	<p>β Piscium 22^h 58^m 47^s +3° 16' 53".85</p> <p>1903 Oct. 13 H. +0.6 II 20 H. +0.3 II Nov. 12 H. +1.8 II 14 H. +0.8 II 1904 Oct. 28 L. +1.1 III 31 L. +0.6 III 1906 Nov. 6 L. +0.2 IV 7 L. -0.3 IV</p> <p>Mean..... +0.64 Corr. -0.37</p>
<p>30 Cephei 22^h 35^m 6^s +63° 3' 52".30</p> <p>1899 Oct. 24 H. 0.0 I 1904 Nov. 19 L. +0.1 III Dec. 1 L. 0.0 III 1906 Nov. 8 L. +0.1 IV 10 L. -0.2 IV</p> <p>Mean..... 0.00 Corr. +0.41</p>	<p>μ Pegasi 22^h 45^m 11^s +24° 4' 24".37</p> <p>1904 June 20 L. -0.6 III Oct. 28 L. +0.5 III</p> <p>Mean..... -0.05 Corr. -0.11</p>	<p>α Piscis Australis 22^h 52^m 8^s -30° 9' 9".03</p> <p>1904 July 10 L. +1.0 III Dec. 16 L. +0.2 III</p> <p>Mean..... +0.60 Corr. -0.65</p>	<p>β Pegasi 22^h 58^m 56^s +27° 32' 25".55</p> <p>1899 Nov. 27 H. -0.5 I 1905 Dec. 6 L. 0.0 III 7 L. -0.5 III</p> <p>Mean..... -0.33 Corr. -0.07</p>
<p>ε Piscis Australis 22^h 35^m 8^s -27° 33' 55".32</p> <p>1903 Nov. 6 H. +2.7 II 1905 Dec. 4 L. +2.0 III 6 L. +2.0 III 1906 Nov. 13 L. +1.7 IV 16 L. +2.2 IV</p> <p>Mean..... +2.12 Corr. -0.63</p>	<p>ζ Cephei 22^h 46^m 7^s +65° 40' 27".39</p> <p>1898 Oct. 28 H. +1.7 I Nov. 15 H. +1.3 I 20 H. +0.7 I 1904 Nov. 28 L. +0.3 III Dec. 1 L. -0.5 III 1906 Nov. 23 L. -0.1 IV 29 L. -0.5 IV</p> <p>Mean..... +0.41 Corr. +0.45</p>	<p>36 H. Cephei 22^h 54^m 12^s +11° 11' 38".45</p> <p>1903 Nov. 4 H. +1.0 II 9 H. +1.1 II 1904 Oct. 21 L. +1.1 III 22 L. +1.0 III 1906 Oct. 26 L. +1.2 IV Nov. 1 L. +0.7 IV</p> <p>Mean..... +1.02 Corr. -0.28</p>	<p>3 Andromedæ 22^h 59^m 41^s +49° 30' "</p> <p>1904 Nov. 7 L. 30.46 III 11 L. 30.34 III</p> <p>Mean..... +49 30 30.40 Corr. +0.24</p>
<p>ζ Pegasi 22^h 36^m 28^s +10° 18' 33".24</p> <p>1898 Nov. 11 H. +0.8 I 1904 Dec. 20 L. +0.6 III 21 L. +0.8 III</p> <p>Mean..... +0.73 Corr. -0.29</p>	<p>ι Cephei s. P. 22^h 46^m 7^s +65° 40' 27".01</p> <p>1904 Nov. 30 L. +0.8 III Dec. 6 L. +0.9 III 1906 Nov. 22 L. +2.8 IV 29 L. +1.1 IV</p> <p>Mean..... +1.40 Corr. -0.85</p>	<p>γ Piscis Australis 22^h 46^m 58^s -33° 24' "</p> <p>1903 Oct. 13 H. 20.05 II 20 H. 19.98 II Nov. 3 H. 21.42 II 6 H. 19.80 II 1904 Nov. 19 L. 20.19 III 30 L. 20.18 III 1905 Dec. 7 L. 20.36 III 1906 Nov. 6 L. 20.12 IV 7 L. 20.25 IV</p> <p>Mean..... -33 24 20.26 Corr. -0.66</p>	<p>α Pegasi 22^h 59^m 47^s +14° 40' 1".82</p> <p>1898 Oct. 28 H. +0.6 I 31 H. -0.9 I Nov. 1 H. -0.9 I 7 H. +0.9 I 19 H. -0.1 I 20 H. -0.6 I 1904 June 20 L. -0.5 III Nov. 2 L. -0.3 III</p> <p>Mean..... -0.22 Corr. -0.23</p>
<p>67 Aquarii 22^h 38^m 1^s -7° 29' "</p> <p>1903 Oct. 19 H. 10.68 II Nov. 2 H. 10.99 II 4 H. 11.55 II 9 H. 9.76 II 1904 Nov. 16 L. 10.81 III 17 L. 10.56 III</p> <p>Mean..... -7 29 10.72 Corr. -0.48</p>	<p>λ Aquarii 22^h 47^m 24^s -8° 6' 42".17</p> <p>1898 Nov. 11 H. +0.6 I 1904 Dec. 8 L. +1.8 III 13 L. +1.1 III 1906 Nov. 13 L. +1.5 IV 16 L. +1.9 IV</p> <p>Mean..... +1.38 Corr. -0.49</p>	<p>36 H. Cephei s. P. 22^h 55^m 13^s +83° 48' "</p> <p>1904 Dec. 1 L. 39.61 III 8 L. 40.05 III 1906 Dec. 2 L. 39.51 IV 18 L. 39.27 IV</p> <p>Mean..... +83 48 39.61 Corr. +0.65</p>	<p>c¹ Aquarii 23^h 1^m 19^s -24° 16' "</p> <p>1903 Oct. 14 H. 58.50 II Nov. 3 H. 59.03 II 6 H. 59.06 II 1904 Dec. 20 L. 59.26 III 21 L. 58.02 III 1906 Nov. 8 L. 58.92 IV 10 L. 59.32 IV</p> <p>Mean..... -24 16 58.87 Corr. -0.62</p>
<p>η Pegasi 22^h 38^m 19^s +29° 41' 52".90</p> <p>1905 Dec. 5 L. 0.0 III 11 L. +0.5 III</p> <p>Mean..... +0.25 Corr. -0.04</p>	<p>13 Lacertæ 22^h 39^m 38^s +41° 17' 39".90</p> <p>1904 Oct. 21 L. -0.6 III 22 L. +0.1 III 1906 Nov. 22 L. -0.5 IV 26 L. -0.1 IV</p> <p>Mean..... -0.28 Corr. +0.12</p>	<p>55 Pegasi 23^h 1^m 58^s +8° 52' 9".03</p> <p>1903 Nov. 2 H. +1.6 II 1905 Dec. 1 L. +0.9 III 4 L. -0.1 III 1906 Nov. 23 L. +0.4 IV 26 L. +0.4 IV</p> <p>Mean..... +0.64 Corr. -0.31</p>	

5 Andromedæ 23 ^h 3 ^m 13 ^s +48° 45' 3".40		φ Aquarii 23 ^h 9 ^m 9 ^s -6° 35' 17".50		10 Andromedæ 23 ^h 15 ^m 7 ^s +41° 31' "		θ Piscium 23 ^h 22 ^m 54 ^s +5° 49' 46".96	
1904 Nov. 19 L.	+0.5 III	1898 Nov. 1 H.	+0.1 I	1899 Nov. 27 H.	47.73 I	1898 Nov. 1 H.	+0.2 I
30 L.	+1.1 III	11 H.	+0.3 I	1904 Nov. 16 L.	50.61 III	11 H.	0.0 I
1906 Nov. 21 L.	+1.1 IV	19 H.	-0.6 I	17 L.	49.79 III	20 H.	+0.5 I
22 L.	+1.0 IV	20 H.	-0.3 I	Mean.....	+41 31 49.38	Dec. 1 H.	+0.6 I
Mean.....	+0.92	1904 Oct. 31 L.	+1.6 III	Corr.	+0.13	1905 Dec. 5 L.	+0.3 III
Corr.	+0.23	Nov. 2 L.	+1.0 III			6 L.	-0.5 III
		Mean.....	+0.35			Mean.....	+0.18
		Corr.	-0.47			Corr.	-0.34
λ Piscium 23 ^h 3 ^m 34 ^s +1° 35' "		ψ ¹ Aquarii 23 ^h 10 ^m 39 ^s -9° 37' 56".98		τ Pegasi 23 ^h 15 ^m 41 ^s +23° 11' 34".47		γ Pegasi 23 ^h 24 ^m 0 ^s +12° 12' 31".90	
1904 Nov. 16 L.	1.10 III	1903 Oct. 20 H.	+0.7 II	1898 Oct. 28 H.	-1.5 I	1904 Dec. 1 L.	+1.1 III
17 L.	1.77 III	Nov. 12 H.	+0.1 II	Nov. 15 H.	+0.2 I	20 L.	0.0 III
1906 Nov. 13 L.	1.74 IV	14 H.	+0.7 II	1904 Nov. 19 L.	0.0 III	Mean.....	+0.55
16 L.	1.40 IV	7 L.	-0.3 III	30 L.	+0.2 III	Corr.	-0.26
Mean.....	+1 35 1.50	11 L.	+0.3 III	1906 Nov. 22 L.	0.0 IV		
Corr.	-0.39	10 L.	+0.4 IV	23 L.	+0.8 IV		
		Mean.....	+0.29	Mean.....	-0.05		
		Corr.	-0.50	Corr.	-0.12		
ε ² Aquarii 23 ^h 4 ^m 7 ^s -21° 42' 54".97		γ Piscium 23 ^h 11 ^m 59 ^s +2° 44' 9".21		ιι G. Sculptoris 23 ^h 15 ^m 56 ^s -27° 32' "		ι H. Cassiopeiæ 23 ^h 25 ^m 25 ^s +57° 59' 52".25	
1905 Dec. 11 L.	+0.8 III	1899 Oct. 24 H.	-0.6 I	1904 Dec. 13 L.	1.66 III	1899 Nov. 27 H.	-1.6 I
12 L.	+0.7 III	1905 Dec. 5 L.	+1.1 III	1905 Dec. 4 L.	3.13 III	1903 Oct. 20 H.	-2.9 II
Mean.....	+0.75	6 L.	+0.4 III	1906 Nov. 13 L.	2.67 IV	Nov. 6 H.	-1.8 II
Corr.	-0.60	Mean.....	+0.30	16 L.	2.51 IV	12 H.	-2.6 II
		Corr.	-0.38	Mean.....	-27 32 2.49	1905 Dec. 7 L.	-2.4 III
				Corr.	-0.63	11 L.	-1.3 III
						Mean.....	-2.10
						Corr.	+0.35
π Cephei 23 ^h 4 ^m 43 ^s +74° 50' 48".42		γ Sculptoris 23 ^h 13 ^m 25 ^s -33° 4' 36".97		δ ¹ Aquarii 23 ^h 17 ^m 43 ^s -20° 38' 48".12		39 H. Cephei 23 ^h 27 ^m 48 ^s +86° 45' 21".23	
1904 Dec. 8 L.	-0.4 III	1903 Nov. 6 H.	+1.0 II	1903 Nov. 4 H.	+0.9 II	1903 Nov. 14 H.	-0.2 II
12 L.	-0.2 III	1904 Dec. 20 L.	+1.1 III	1904 July 10 L.	+0.8 III	1904 Dec. 14 L.	-0.6 III
1906 Nov. 29 L.	-0.3 IV	21 L.	+1.8 III	1905 Dec. 12 L.	+0.6 III	16 L.	-0.2 III
Dec. 2 L.	-0.6 IV	Mean.....	+1.30	18 L.	+0.9 III	Mean.....	-0.33
Mean.....	-0.38	Corr.	-0.66	Mean.....	+0.80	Corr.	+0.68
Corr.	+0.55			Corr.	-0.59		
π Cephei s. p. 23 ^h 4 ^m 43 ^s +74° 50' 48".46		ψ ² Aquarii 23 ^h 13 ^m 46 ^s -10° 9' 27".13		ν Pegasi 23 ^h 20 ^m 23 ^s +22° 51' 12".78		39 H. Cephei s. p. 23 ^h 27 ^m 48 ^s +86° 45' 21".21	
1903 Apr. 29 E.	+0.2 II	1903 Nov. 2 H.	+1.3 II	1904 Nov. 2 L.	0.0 III	1903 Apr. 29 E.	+1.4 II
May 1 E.	+1.0 II	1905 Dec. 7 L.	+0.4 III	7 L.	-0.3 III	May 2 H.	+0.8 II
2 H.	+0.7 II	11 L.	+0.5 III	1906 Nov. 7 L.	+0.3 IV	5 E.	+0.6 II
5 E.	+2.6 II	13 L.	+1.3 III	8 L.	+0.2 IV	9 H.	+2.8 II
12 E.	+1.2 II	Mean.....	+0.88	Mean.....	+0.05	10 H.	+1.6 II
1904 Dec. 6 L.	+0.9 III	Corr.	-0.51	Corr.	-0.13	17 H.	+1.5 II
13 L.	+1.2 III					1904 Dec. 15 L.	+0.9 III
1906 Dec. 3 L.	+1.3 IV					17 L.	+0.4 III
18 L.	+1.9 IV					Mean.....	+1.25
Mean.....	+1.22					Corr.	-0.73
Corr.	-0.81						
σ Pegasi 23 ^h 6 ^m 41 ^s +8° 10' 37".38		ο Cephei 23 ^h 14 ^m 31 ^s +67° 33' 51".62		4 Cassiopeiæ 23 ^h 20 ^m 24 ^s +61° 44' 1".50		δ ² Aquarii 23 ^h 28 ^m 3 ^s -21° 28' 1".94	
1904 Dec. 14 L.	+0.5 III	1898 Oct. 31 H.	-0.2 I	1904 Oct. 28 L.	-0.1 III	1903 Nov. 4 H.	+0.4 II
16 L.	+0.5 III	Nov. 7 H.	-0.5 I	31 L.	+0.1 III	1904 July 10 L.	+0.1 III
1906 Oct. 26 L.	+0.6 IV	25 H.	-0.2 I	1906 Nov. 1 L.	-0.7 IV	Nov. 17 L.	+0.6 III
Nov. 1 L.	+0.5 IV	1904 Dec. 8 L.	-0.3 III	6 L.	0.0 IV	1906 Nov. 22 L.	+2.4 IV
Mean.....	+0.52	12 L.	-0.4 III	Mean.....	-0.18	23 L.	+1.2 IV
Corr.	-0.31	1906 Nov. 29 L.	+0.1 IV	Corr.	+0.40	Mean.....	+0.94
		Dec. 2 L.	0.0 IV			Corr.	-0.60
		Mean.....	-0.22				
		Corr.	+0.47				
5 H ¹ . Cassiopeiæ 23 ^h 8 ^m 28 ^s +56° 36' 50".95		ο Cephei s. p. 23 ^h 14 ^m 31 ^s +67° 33' 51".68		κ Piscium 23 ^h 21 ^m 48 ^s +0° 42' 28".93		72 Pegasi 23 ^h 28 ^m 59 ^s +30° 46' 24".23	
1899 Nov. 24 H.	-0.3 I	1904 Dec. 6 L.	+0.1 III	1904 Nov. 11 L.	+0.2 III	1899 Nov. 24 H.	+0.7 I
1904 July 10 L.	0.0 III	13 L.	+1.8 III	16 L.	-0.5 III	1904 Nov. 19 L.	-0.5 III
Oct. 28 L.	-0.5 III	1906 Dec. 3 L.	+1.5 IV	1906 Nov. 10 L.	+0.5 IV	30 L.	+0.5 III
1906 Nov. 6 L.	-0.1 IV	18 L.	+2.0 IV	21 L.	+0.2 IV	1906 Nov. 13 L.	+0.1 IV
7 L.	-0.6 IV	Mean.....	+1.15	Mean.....	+0.10	16 L.	-0.5 IV
Mean.....	0.30	Corr.	-0.85	Corr.	-0.40	Mean.....	+0.06
Corr.	+0.33			Corr.	-0.02	Corr.	-0.02

14 Piscium			γ Cephei s. p.			19 Piscium			Groombridge 4163		
23 ^h 29 ^m 1 ^s	-1° 47' 59".29		23 ^h 35 ^m 14 ^s	+77° 4' 27".90		23 ^h 41 ^m 17 ^s	+2° 55' 55".22		23 ^h 49 ^m 58 ^s	+73° 51' 13".81	
1905 Dec. 4 L.	-0.5 III		1903 Apr. 28 E.	-0.3 II		1903 Nov. 4 H.	+0.1 II		1898 Oct. 31 H.	-0.5 I	
13 L.	+0.6 III		May 4 E.	[+3.0] II		14 H.	+0.2 II		Nov. 11 H.	-0.2 I	
Mean.....	+0.05		11 E.	+1.6 II		1904 Oct. 31 L.	+1.6 III		25 H.	-1.1 I	
Corr.	-0.42		13 E.	-0.2 II		Nov. 2 L.	+0.3 III		Dec. 1 H.	+0.2 I	
			15 H.	+1.1 II		1906 Nov. 8 L.	+1.0 IV		1904 Dec. 14 L.	-1.3 III	
			21 E.	-0.4 II		21 L.	+0.3 IV		16 L.	-0.9 III	
			1904 Dec. 6 L.	+0.8 III		Mean.....	+0.58		1906 Dec. 23 L.	-1.0 IV	
			13 L.	+1.2 III		Corr.	-0.37		Mean.....	-0.69	
			Mean.....	+0.54					Corr.	+0.54	
			Corr.	-0.80							
15 Andromedæ			μ Sculptoris			41 H. Cephei			Groombridge 4163 s. p.		
23 ^h 29 ^m 44 ^s	+39° 41' 5".59		23 ^h 35 ^m 23 ^s	-32° 37' "		23 ^h 43 ^m 8 ^s	+67° 15' 4".10		23 ^h 49 ^m 58 ^s	+73° 51' 13".80	
1904 Dec. 13 L.	-0.1 III		1903 Oct. 20 H.	34.52 II		1904 Dec. 8 L.	+0.3 III		1903 Apr. 28 E.	+1.0 II	
21 L.	+1.5 III		1905 Dec. 7 L.	32.28 III		12 L.	+0.1 III		May 5 E.	+0.5 II	
Mean.....	+0.70		12 L.	32.45 III		Mean.....	+0.20		6 E.	+0.2 II	
Corr.	+0.10		1906 Oct. 26 L.	32.26 IV		Corr.	+0.47		11 E.	+1.4 II	
			Nov. 1 L.	33.11 IV					21 E.	+0.3 II	
248 G. Aquarii			Mean.....	-32 37 32.93		41 H. Cephei s. p.			1904 Dec. 15 L.	+1.0 III	
23 ^h 30 ^m 23 ^s	-8° 1' "		Corr.	-0.66		23 ^h 43 ^m 8 ^s	+67° 15' 4".10		20 L.	-0.1 III	
1904 Oct. 28 L.	3.57 III		κ Andromedæ			1904 Dec. 6 L.	-0.2 III		1906 Dec. 18 L.	+1.3 IV	
31 L.	3.04 III		23 ^h 35 ^m 29 ^s	+43° 46' 48".55		13 L.	+1.3 III		Mean.....	+0.70	
1906 Nov. 6 L.	4.00 IV		1899 Nov. 27 H.	+0.1 I		Mean.....	+0.55		Corr.	-0.82	
7 L.	3.89 IV		1905 Dec. 11 L.	+0.2 III		Corr.	-0.85				
Mean.....	-8 1 3.62		18 L.	+0.1 III					ψ Pegasi		
Corr.	-0.49		Mean.....	+0.13		δ Sculptoris			23 ^h 52 ^m 41 ^s	+24° 35' 7".45	
			Corr.	+0.16		23 ^h 43 ^m 43 ^s	-28° 41' 1".38		1904 July 10 L.	+0.6 III	
λ Andromedæ			λ Piscium			1905 Dec. 4 L.	+1.4 III		Nov. 7 L.	+0.9 III	
23 ^h 32 ^m 40 ^s	+45° 54' 56".88		23 ^h 36 ^m 57 ^s	+1° 13' 46".07		11 L.	+1.4 III		1906 Dec. 7 L.	+1.2 IV	
1898 Oct. 31 H.	+0.4 I		1899 Dec. 2 H.	+0.2 I		Mean.....	+1.40		11 L.	+0.8 IV	
1904 Nov. 2 L.	+0.5 III		1903 Nov. 6 H.	+1.0 II		Corr.	-0.64		Mean.....	+0.88	
7 L.	+0.2 III		1904 Nov. 26 L.	+0.6 III					Corr.	-0.11	
1906 Nov. 8 L.	+0.5 IV		30 L.	+0.9 III		ϕ Pegasi			27 Piscium		
10 L.	+0.8 IV		1906 Nov. 13 L.	+0.5 IV		23 ^h 47 ^m 24 ^s	+18° 33' 53".62		23 ^h 53 ^m 33 ^s	-4° 6' 39".03	
21 L.	+0.9 IV		16 L.	+1.0 IV		1899 Dec. 2 H.	+0.3 I		1905 Dec. 12 L.	+0.6 III	
Mean.....	+0.55		22 L.	+0.7 IV		1904 Dec. 21 L.	+1.0 III		18 L.	+0.4 III	
Corr.	+0.19		Mean.....	+0.70		1905 Dec. 5 L.	+0.4 III		1906 Nov. 21 L.	+0.6 IV	
			Corr.	-0.39		Mean.....	+0.57		26 L.	+0.2 IV	
ϵ Andromedæ			ω^2 Aquarii			Corr.	-0.18		Mean.....	+0.45	
23 ^h 33 ^m 14 ^s	+42° 42' 52".04		23 ^h 37 ^m 32 ^s	-15° 5' 52".22					Corr.	-0.45	
1904 Nov. 11 L.	-0.1 III		1904 Nov. 17 L.	+0.9 III		25 Piscium			ω Piscium		
16 L.	0.0 III		19 L.	+1.3 III		23 ^h 47 ^m 57 ^s	+1° 32' 4".67		23 ^h 54 ^m 11 ^s	+6° 18' 34".77	
Mean.....	-0.05		Mean.....	+1.10		1903 Nov. 12 H.	+1.3 II		1898 Nov. 7 H.	0.0 I	
Corr.	+0.14		Corr.	-0.55		1904 Nov. 11 L.	-0.4 III		15 H.	0.0 I	
						19 L.	+0.1 III		19 H.	0.0 I	
ϵ Piscium			ι^1 Aquarii			Mean.....	+0.33		30 H.	+0.4 I	
23 ^h 34 ^m 48 ^s	+5° 5' 2".64		23 ^h 39 ^m 1 ^s	-18° 49' 55".27		Corr.	-0.39		1905 Dec. 13 L.	+0.3 III	
1898 Nov. 11 H.	-0.3 I		1904 Dec. 13 L.	+1.7 III					19 L.	-0.6 III	
20 H.	+0.2 I		20 L.	+1.4 III		274 G. Aquarii			1906 Dec. 2 L.	+0.6 IV	
Dec. 1 H.	-0.1 I		1906 Nov. 23 L.	+1.1 IV		23 ^h 48 ^m 11 ^s	-24° 47' "		4 L.	+0.4 IV	
1905 Dec. 5 L.	+0.4 III		Dec. 1 L.	+1.2 IV		1904 Nov. 30 L.	6.73 III		Mean.....	+0.14	
6 L.	0.0 III		2 L.	+1.3 IV		Dec. 20 L.	6.76 III		Corr.	-0.34	
Mean.....	+0.04		Mean.....	+1.34		1906 Nov. 13 L.	6.55 IV				
Corr.	-0.35		Corr.	-0.58		23 L.	7.07 IV		30 Piscium		
						Mean.....	-24 47 6.78		23 ^h 56 ^m 50 ^s	-6° 34' 11".48	
γ Cephei			ϕ Andromedæ			Corr.	-0.62		1899 Dec. 2 H.	+1.1 I	
23 ^h 35 ^m 14 ^s	+77° 4' 27".57		23 ^h 41 ^m 5 ^s	+45° 51' 54".02		ρ Cassiopeia			1903 Nov. 14 H.	+2.3 II	
1898 Nov. 1 H.	+0.3 I		1899 Nov. 24 H.	+0.1 I		23 ^h 49 ^m 23 ^s	+56° 56' 35".02		1905 Dec. 4 L.	+1.3 III	
7 H.	+0.4 I		1904 July 10 L.	+0.4 III		1904 Nov. 26 L.	+0.6 III		6 L.	+1.2 III	
30 H.	-2.1 I		Nov. 7 L.	-0.5 III		Dec. 13 L.	+0.2 III		Mean.....	+1.48	
1903 Nov. 12 H.	-1.5 II		1906 Nov. 6 L.	+0.5 IV		Mean.....	+0.40		Corr.	-0.47	
1904 Dec. 8 L.	-0.2 III		7 L.	+0.6 IV		Corr.	+0.33				
12 L.	+0.2 III		Mean.....	+0.22					2 Ceti		
Mean.....	-0.48		Corr.	+0.19					23 ^h 58 ^m 37 ^s	-17° 53' 33".85	
Corr.	+0.58								1903 Nov. 12 H.	+1.3 II	
									1905 Dec. 5 L.	+2.0 III	
									7 L.	+2.0 III	
									Mean.....	+1.77	
									Corr.	-0.57	

MINOR PLANETS.

(4) Vesta						(7) Iris					
Date.	Obsr.	α	δ			Date.	Obsr.	α	δ		
			O-C						O-C		
		h m	° ' "	"				h m	° ' "	"	
1902						1899					
July 2	H.	19 46	-22 14	18.06	+2.1*	Sept. 11	H.	1 32	+20 6	28.58	+5.5†
5	H.	43	34	37.39	+1.6	14	H.	32	11	38.08	+6.5
8	H.	40	54	56.80	+3.3	27	H.	27	3	38.10	+8.0
11	H.	37	-23 15	9.20	+2.3	28	H.	26	0	51.84	+7.5
13	H.	36	28	24.56	+3.9	30	H.	25	+19 54	24.10	+7.3
16	H.	33	47	55.89	+3.8	Oct. 1	H.	24	50	43.85	+8.2
22	H.	27	-24 25	0.92	+1.8	3	H.	23	42	26.60	+7.8
Aug. 3	H.	16	-25 27	57.84	+0.8	13	H.	16	+18 44	19.34	+8.0
7	H.	14	45	5.05	-1.8	19	H.	11	+17 58	32.53	+8.4
22	H.	8	-26 31	17.18	-1.2	21	H.	9	41	58.32	+6.9
						24	H.	7	16	19.57	+7.2
						Nov. 24	H.	0 59	+13 18	9.26	+6.0
						27	H.	1 0	4	6.89	+4.3

* Nautical Almanac 1902.

† Berliner Jahrbuch 1901.

CATALOGUE.

For explanation, see page XXXVII.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
1	33 Piscium.....	4.7	0 0 13	- 6 16 0.86	+20.047	-0.009	1901.51	5	.
2	5 Ceti.....	6.3	0 3 5	- 3 0 15.78	+20.045	-0.014	1905.90	4	.
3	α Andromedæ.....	2.2	0 3 13	+28 32 17.29	+20.045	-0.015	1903.10	3	.
4	β Cassiopeiæ.....	2.4	0 3 50	+58 35 53.42	+20.044	-0.017	1903.93	6	.
5	22 Andromedæ.....	5.1	0 5 7	+45 30 57.30	+20.042	-0.019	1904.48	5	.
6	κ^2 Sculptoris.....	5.6	0 6 30	-28 21 24.04	+20.039	-0.021	1905.53	5	.
7	γ Pegasi.....	2.9	0 8 5	+14 37 39.03	+20.034	-0.024	1903.58	3	.
8	35 Piscium.....	5.9	0 9 50	+ 8 15 56.32	+20.028	-0.028	1905.14	5	.
9	318 B. Cephei.....	6.2	0 10 32	+76 23 42.32	+20.026	-0.031	1903.58	3	6
10	σ Andromedæ.....	4.5	0 13 6	+36 13 50.94	+20.014	-0.034	1902.16	4	.
11	ϵ Ceti.....	3.8	0 14 20	- 9 22 41.60	+20.008	-0.036	1902.76	3	.
12	μ Piscium.....	5.6	0 15 27	+ 7 38 5.80	+20.001	-0.039	1905.08	6	.
13	ρ Andromedæ.....	5.2	0 15 51	+37 24 53.30	+19.999	-0.040	1905.11	6	.
14	44 Piscium.....	6.0	0 20 17	+ 1 23 9.17	+19.968	-0.048	1904.55	5	.
15	10 Ceti.....	6.4	0 21 30	- 0 36 12.16	+19.959	-0.051	1903.92	3	.
16	12 Ceti.....	6.0	0 24 56	- 4 30 35.37	+19.928	-0.057	1902.59	6	.
17	49 G. Ceti.....	5.2	0 25 23	-24 20 26.70	+19.924	-0.057	1904.88	2	.
18	κ Cassiopeiæ.....	4.2	0 27 19	+62 22 47.54	+19.905	-0.067	1904.69	5	.
19	77 G. Sculptoris.....	5.6	0 28 44	-30 6 33.81	+19.889	-0.063	1905.94	4	.
20	13 Ceti.....	5.2	0 30 6	- 4 8 36.68	+19.874	-0.068	1904.95	5	.
21	ζ Cassiopeiæ.....	3.4	0 31 24	+53 20 47.06	+19.859	-0.075	1903.93	3	.
22	π Andromedæ.....	4.4	0 31 32	+33 10 8.24	+19.857	-0.072	1901.72	5	.
23	319 B. Cephei.....	6.4	0 32 12	+81 56 30.72	+19.849	-0.098	1905.32	2	3
24	82 B. Ceti.....	5.7	0 32 12	-25 19 2.48	+19.849	-0.074	1905.06	4	.
25	ϵ Andromedæ.....	4.5	0 33 16	+28 46 6.80	+19.836	-0.075	1904.80	5	.
26	δ Andromedæ.....	3.5	0 33 59	+30 18 48.56	+19.827	-0.078	1906.01	2	.
27	α Cassiopeiæ.....	2.5	0 34 50	+55 59 21.15	+19.816	-0.083	1902.12	3	.
28	β Ceti.....	2.2	0 38 34	-18 32 7.85	+19.764	-0.082	1904.79	■	.
29	21 Cassiopeiæ.....	5.6	0 39 2	+74 26 28.90	+19.757	-0.104	1905.09	3	3
30	0 Cassiopeiæ.....	4.7	0 39 9	+47 44 13.37	+19.755	-0.091	1904.90	2	.
31	73 G. Ceti.....	5.3	0 39 48	-22 33 20.28	+19.745	-0.083	1905.89	4	.
32	ζ Andromedæ.....	4.3	0 42 2	+23 43 22.85	+19.711	-0.092	1905.95	4	.
33	γ Cassiopeiæ.....	3.6	0 43 3	+57 17 5.91	+19.694	-0.111	1903.34	3	.
34	147 B. Piscium.....	5.8	0 43 8	+ 4 45 52.86	+19.693	-0.095	1905.96	4	.
35	ν Cassiopeiæ.....	5.0	0 43 10	+50 25 22.61	+19.692	-0.101	1905.94	4	.
36	δ Piscium.....	4.6	0 43 30	+ 7 2 27.10	+19.687	-0.094	1902.43	4	.
37	ν Andromedæ.....	4.4	0 44 18	+40 32 3.30	+19.674	-0.101	1904.73	4	.
38	50 H ¹ . Cassiopeiæ.....	5.4	0 44 39	+63 42 11.28	+19.668	-0.110	1906.46	4	.
39	20 Ceti.....	4.9	0 47 54	- 1 41 14.53	+19.611	-0.101	1904.90	2	.
40	γ Cassiopeiæ.....	2.2	0 50 40	+60 10 31.52	+19.559	-0.123	1904.76	8	.
41	μ Andromedæ.....	3.9	0 51 12	+37 57 25.06	+19.549	-0.116	1900.59	7	.
42	h Piscium.....	5.6	0 52 25	+28 27 6.48	+19.525	-0.115	1905.95	5	.
43	α Sculptoris.....	4.4	0 53 47	-29 53 52.03	+19.497	-0.106	1905.95	4	.
44	43 H. Cephei.....	4.5	0 55 1	+85 43 14.75	+19.472	-0.267	1905.21	4	8
45	1 B. Ursæ Minoris.....	6.5	0 55 37	+88 29 15.31	+19.460	-0.542	1905.05	2	5
46	1 Piscium.....	4.4	0 57 45	+ 7 21 6.58	+19.414	-0.121	1905.18	5	.
47	26 Ceti.....	6.1	0 58 40	+ 0 40 50.79	+19.394	-0.122	1904.96	2	.
48	72 Piscium.....	5.6	0 59 49	+14 24 30.35	+19.368	-0.127	1906.22	4	.
49	μ Cassiopeiæ.....	5.2	1 1 37	+54 25 40.89	+19.327	-0.185	1904.52	7	.
50	ϵ Piscium.....	5.7	1 3 13	+ 5 7 13.43	+19.289	-0.130	1904.94	2	.
51	η Ceti.....	3.6	1 3 34	-10 42 44.64	+19.281	-0.129	1904.55	2	.
52	41 H. Cephei.....	5.7	1 3 37	+79 8 29.77	+19.279	-0.210	1904.94	2	4
53	β Andromedæ.....	2.4	1 4 8	+35 5 25.15	+19.267	-0.144	1900.46	10	.
54	9 Piscium.....	5.0	1 5 36	+30 53 34.08	+19.231	-0.144	1906.33	3	.
55	χ Piscium.....	4.9	1 6 8	+20 30 10.89	+19.219	-0.142	1905.95	4	.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
56	τ Piscium	4.7	1 6 9	+29 33 31.35	+19.218	-0.145	1906.46	4	...
57	ζ^1 Piscium	5.6	1 8 30	+7 2 46.83	+19.158	-0.143	1904.96	2	...
58	37 Ceti	5.2	1 9 22	-8 27 34.93	+19.136	-0.140	1906.24	4	...
59	f Piscium	5.3	1 12 38	+3 5 17.04	+19.048	-0.148	1905.20	8	...
60	ν Piscium	4.7	1 13 58	+26 44 18.60	+19.012	-0.160	1903.95	3	...
61	l Piscium	5.6	1 15 35	+28 12 56.32	+18.966	-0.164	1904.95	2	...
62	ξ Andromedæ	5.0	1 16 27	+45 0 17.67	+18.942	-0.176	1905.97	2	...
63	ψ Cassiopeiæ	5.0	1 18 52	+67 36 29.38	+18.872	-0.214	1905.93	3	5
64	109 G. Sculptoris	5.8	1 18 52	-31 28 0.10	+18.872	-0.146	1905.97	4	...
65	θ Ceti	3.8	1 19 1	-8 41 59.12	+18.867	-0.156	1905.54	4	...
66	δ Cassiopeiæ	2.8	1 19 16	+59 42 56.26	+18.860	-0.202	1905.57	4	...
67	ω Andromedæ	5.0	1 21 40	+44 53 25.24	+18.787	-0.191	1905.94	4	...
68	α Ursæ Minoris	2.1	1 22 33	+88 46 26.47	+18.760	-1.311	1903.42	126	128
69	38 Cassiopeiæ	6.0	1 23 47	+69 45 0.34	+18.722	-0.238	1905.91	■	4
70	48 Ceti	5.1	1 24 48	-22 8 47.54	+18.690	-0.160	1904.95	2	...
71	μ Piscium	5.1	1 24 57	+5 37 41.76	+18.686	-0.175	1904.95	2	...
72	η Piscium	3.7	1 26 8	+14 49 49.11	+18.648	-0.180	1905.96	2	...
73	40 Cassiopeiæ	5.5	1 30 31	+72 31 49.58	+18.503	-0.272	1906.05	4	4
74	ν Andromedæ	4.2	1 30 56	+40 54 17.12	+18.490	-0.204	1905.97	4	...
75	π Piscium	5.6	1 31 48	+11 37 48.78	+18.460	-0.188	1906.44	4	...
76	ν Persei	3.8	1 31 51	+48 7 17.86	+18.458	-0.218	1905.52	4	...
77	τ Andromedæ	4.9	1 34 40	+40 4 14.51	+18.360	-0.214	1904.96	2	...
78	ω Cassiopeiæ	5.5	1 34 56	+67 32 14.38	+18.352	-0.265	1904.39	8	2
79	ν Piscium	4.7	1 36 14	+4 53 53.77	+18.306	-0.193	1905.99	4	...
80	ϕ Persei	4.2	1 37 24	+50 11 6.07	+18.264	-0.233	1905.01	2	...
81	τ Ceti	3.6	1 39 25	-16 27 45.29	+18.190	-0.171	1906.01	2	...
82	σ Piscium	4.5	1 40 7	+8 39 16.83	+18.164	-0.203	1905.23	5	...
83	ϵ Sculptoris	5.4	1 40 58	-25 33 8.28	+18.133	-0.182	1906.45	4	...
84	χ Ceti	4.8	1 44 40	-11 10 52.31	+17.992	-0.196	1905.04	4	...
85	54 Ceti	5.9	1 45 34	+10 32 53.22	+17.958	-0.213	1906.49	4	...
86	α Persei	5.6	1 45 48	+50 17 55.13	+17.949	-0.254	1905.73	3	...
87	ζ Ceti	3.9	1 46 31	-10 49 45.36	+17.920	-0.201	1904.97	2	...
88	ϵ Cassiopeiæ	3.4	1 47 12	+63 10 39.64	+17.894	-0.289	1904.07	2	...
89	α Trianguli	3.6	1 47 23	+29 5 29.54	+17.886	-0.232	1905.31	4	...
90	γ Arietis (south star)	4.8	1 48 3	+18 48 12.05	+17.860	-0.226	1906.02	2	...
91	ξ Piscium	4.8	1 48 23	+2 41 38.48	+17.847	-0.214	1905.01	2	...
92	β Arietis	2.7	1 49 7	+20 19 8.78	+17.817	-0.229	1903.97	9	...
93	λ Arietis	4.8	1 52 21	+23 6 30.20	+17.686	-0.236	1905.95	2	...
94	50 Cassiopeiæ	4.1	1 54 53	+71 56 15.26	+17.580	-0.359	1905.05	2	2
95	ν Ceti	4.2	1 55 18	-21 33 44.53	+17.563	-0.207	1906.47	4	...
96	53 Cassiopeiæ	5.6	1 55 36	+63 54 25.83	+17.550	-0.317	1905.95	4	...
97	α Piscium* (mean)	3.9	1 56 52	+2 16 51.40	+17.496	-0.228	1906.01	4	...
98	γ Andromedæ	2.3	1 57 45	+41 50 59.50	+17.458	-0.270	1906.58	4	...
99	ν Fornacis	4.7	2 0 1	-29 46 34.79	+17.361	-0.204	1905.01	2	...
100	α Arietis	2.2	2 1 32	+22 59 21.99	+17.294	-0.257	1904.84	5	...
101	β Trianguli	3.1	2 3 35	+34 30 51.74	+17.202	-0.275	1905.62	5	...
102	15 Arietis	5.9	2 5 5	+19 1 43.11	+17.135	-0.259	1904.02	3	...
103	55 Cassiopeiæ	6.2	2 6 38	+66 3 20.73	+17.064	-0.363	1906.07	4	4
104	6 Persei	5.4	2 6 57	+50 36 4.22	+17.049	-0.314	1905.95	2	...
105	ξ^1 Ceti	4.5	2 7 42	+8 22 39.62	+17.015	-0.252	1906.02	4	...
106	μ Fornacis	5.2	2 8 30	-31 11 34.70	+16.977	-0.211	1905.96	4	...
107	γ Trianguli	4.1	2 11 22	+33 23 5.42	+16.843	-0.288	1906.03	5	...
108	67 Ceti	5.7	2 12 0	-6 52 57.65	+16.813	-0.245	1904.08	2	...
109	θ Arietis	5.7	2 12 34	+19 26 19.53	+16.786	-0.273	1905.97	2	...
110	σ Ceti	1.7-9.6	2 14 18	-3 25 54.66	+16.793	-0.251	1906.55	4	...
111	κ Fornacis	5.4	2 17 58	-24 16 14.05	+16.523	-0.234	1904.70	7	...
112	ξ Arietis	5.5	2 19 27	+10 9 28.37	+16.449	-0.274	1906.02	4	...
113	ϵ Cassiopeiæ* (brightest)	4.8	2 20 49	+66 57 11.19	+16.380	-0.417	1906.08	4	4
114	ρ Ceti	4.9	2 21 7	-12 44 28.23	+16.365	-0.250	1905.97	4	...
115	ξ^2 Ceti	4.3	2 22 50	+8 0 42.84	+16.278	-0.278	1905.24	5	...

97. Double, 4.3^m-5.2^m, 3'', 320°.113. Triple, 4^m.8-7^m.0, 2'', 250°; 4^m.8-8^m.2, 7'', 110°; assumed that brightest star was observed, see p. IX.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
116	27 Arietis	6.4	2 25 22	+17 15 41.60	+16.148	-0.294	1905.95	2	.
117	σ Ceti	4.8	2 27 21	-15 41 1.57	+16.044	-0.255	1906.02	2	.
118	36 H. Cassiopeiae	5.3	2 28 31	+72 22 52.00	+15.983	-0.500	1905.06	2	2
119	128 H ¹ . Ceti	5.9	2 30 30	+6 24 42.16	+15.872	-0.310	1904.98	2	.
120	ν Ceti	5.0	2 30 38	+5 9 24.72	+15.871	-0.287	1904.82	5	.
121	ν Arietis	5.4	2 33 8	+21 31 44.59	+15.736	-0.314	1906.49	4	.
122	142 H ¹ . Cephei	5.9	2 33 21	+81 1 29.06	+15.724	-0.761	1905.40	4	7
123	δ Ceti	4.0	2 34 21	-0 6 10.10	+15.669	-0.286	1905.02	6	.
124	118 H ¹ . Cassiopeiae	5.8	2 36 13	+67 23 58.94	+15.567	-0.476	1905.05	2	2
125	μ Arietis	5.7	2 36 44	+19 35 8.31	+15.539	-0.318	1905.07	2	.
126	θ Persei	4.2	2 37 22	+48 48 20.13	+15.504	-0.387	1906.44	3	.
127	35 Arietis	4.6	2 37 35	+27 16 54.77	+15.492	-0.332	1906.03	2	.
128	γ Ceti*	3.7	2 38 7	+2 48 51.19	+15.462	-0.294	1906.27	4	.
129	π Ceti	4.4	2 39 22	-14 16 55.30	+15.392	-0.273	1905.95	2	.
130	μ Ceti	4.4	2 39 32	+9 41 30.95	+15.383	-0.311	1906.04	4	.
131	39 Arietis	4.6	2 41 57	+28 49 54.31	+15.246	-0.345	1904.82	5	.
132	η Persei	3.9	2 43 24	+55 28 50.42	+15.164	-0.421	1906.04	4	.
133	41 Arietis	3.7	2 44 6	+26 50 53.72	+15.124	-0.344	1906.57	4	.
134	β Fornacis	4.5	2 44 54	-32 49 32.34	+15.078	-0.249	1906.29	4	.
135	σ Arietis	5.5	2 45 58	+14 40 12.24	+15.016	-0.326	1905.08	2	.
136	τ ² Eridani	4.8	2 46 30	-21 24 57.73	+14.985	-0.269	1906.01	2	.
137	ε Persei	4.1	2 47 10	+52 21 12.03	+14.946	-0.417	1904.89	7	.
138	η Eridani	4.0	2 51 33	-9 17 47.25	+14.689	-0.298	1904.48	2	.
139	47 H. Cephei	3.9	2 52 47	+79 1 24.82	+14.615	-0.781	1906.09	4	4
140	ε Arietis* (mean)	4.6	2 53 30	+20 56 26.50	+14.572	-0.349	1905.55	4	.
141	λ Ceti	4.7	2 54 21	+8 30 31.68	+14.520	-0.329	1905.02	6	.
142	α Ceti	2.8	2 57 3	+3 41 50.80	+14.356	-0.325	1905.04	5	.
143	γ Persei	3.1	2 57 33	+53 6 54.19	+14.326	-0.447	1905.44	7	.
144	τ ³ Eridani	4.2	2 57 59	-24 0 59.64	+14.300	-0.275	1905.98	3	.
145	ρ Persei	3.4-4.2	2 58 46	+38 27 10.00	+14.251	-0.400	1906.12	4	.
146	β Persei	2.1-3.2	3 1 40	+40 34 13.64	+14.072	-0.410	1904.71	5	.
147	ε Persei	4.2	3 1 51	+49 13 52.46	+14.060	-0.468	1905.25	5	.
148	δ Arietis	4.5	3 5 55	+19 20 54.67	+13.805	-0.369	1905.55	4	.
149	48 H. Cephei	5.5	3 7 37	+77 22 2.39	+13.696	-0.801	1905.84	4	4
150	94 Ceti	5.1	3 7 40	-1 34 12.32	+13.693	-0.333	1906.05	5	.
151	12 Eridani	4.0	3 7 49	-29 22 47.67	+13.683	-0.280	1906.10	4	.
152	ζ Arietis	5.0	3 9 9	+20 40 25.35	+13.598	-0.374	1905.68	6	.
153	ζ Eridani	4.9	3 10 59	-9 11 27.54	+13.480	-0.320	1906.53	4	.
154	1 H ¹ . Camelopardalis	4.8	3 11 11	+65 17 12.19	+13.467	-0.570	1906.11	4	4
155	κ Ceti	5.0	3 14 7	+3 0 13.40	+13.276	-0.351	1906.01	2	.
156	τ ¹ Arietis	5.2	3 15 27	+20 47 12.35	+13.188	-0.386	1906.06	4	.
157	α Persei	1.9	3 17 11	+49 30 19.43	+13.074	-0.477	1902.58	8	.
158	o Tauri	3.8	3 19 26	+8 40 36.38	+12.924	-0.364	1905.61	4	.
159	2 H. Camelopardalis	4.4	3 20 58	+59 35 31.08	+12.821	-0.547	1906.50	4	.
160	ε Tauri	3.8	3 21 45	+9 23 2.93	+12.768	-0.371	1905.02	6	.
161	σ Persei	4.6	3 23 31	+47 39 0.60	+12.648	-0.482	1906.11	4	.
162	s Tauri	5.1	3 24 56	+10 59 36.31	+12.552	-0.377	1905.89	5	.
163	f Tauri	4.3	3 25 21	+12 35 38.90	+12.524	-0.382	1906.57	6	.
164	ε Eridani	3.8	3 28 13	-9 47 47.73	+12.327	-0.323	1904.66	5	.
165	τ ³ Eridani	4.3	3 29 22	-21 58 5.33	+12.248	-0.311	1905.68	5	.
166	10 Tauri	4.4	3 31 46	+0 5 1.16	+12.081	-0.359	1905.62	4	.
167	11 H ¹ . Camelopardalis	5.3	3 33 28	+62 53 33.66	+11.961	-0.609	1906.03	5	.
168	149 H ¹ . Cephei	5.8	3 33 55	+86 19 56.58	+11.930	-2.367	1905.06	4	9
169	11 Tauri	6.2	3 34 48	+25 0 22.01	+11.868	-0.425	1903.79	4	.
170	δ Persei	3.1	3 35 48	+47 28 4.73	+11.797	-0.507	1903.45	6	.
171	13 H ¹ . Camelopardalis	5.8	3 36 33	+66 53 16.06	+11.744	-0.672	1905.96	5	4
172	o Persei	3.9	3 38 3	+31 58 17.51	+11.638	-0.450	1906.12	5	.
173	δ Fornacis	4.9	3 38 16	-32 15 27.21	+11.622	-0.288	1904.52	2	.
174	ε Persei	3.9	3 38 24	+42 15 46.07	+11.613	-0.488	1906.09	4	.
175	δ Eridani	3.7	3 38 27	-10 6 1.50	+11.609	-0.346	1906.08	4	.
176	17 Tauri	3.8	3 38 56	+23 47 56.81	+11.574	-0.428	1906.56	4	.
177	5 H. Camelopardalis	4.7	3 39 48	+71 1 27.42	+11.513	-0.753	1905.06	5	4
178	η Tauri	3.0	3 41 32	+23 47 45.71	+11.388	-0.432	1904.56	6	.
179	τ ⁶ Eridani	4.3	3 42 33	-23 32 45.65	+11.315	-0.314	1906.34	4	.
180	27 Tauri	8.3	3 43 13	+23 44 51.88	+11.267	-0.434	1905.91	6	.

128. Double, 3^m 7-6^m 2, 1st, 290^o, assumed that brighter star was observed, see p. 1X
 140. Double, 5^m 2-5^m 6, 1st, 4, 295^o

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
181	τ^7 Eridani.	5.0	<i>h m s</i> 3 43 22	<i>° ' "</i> -24 11 3.58	" +11.256	" -0.316	1906.09	4	.
182	ζ Persei.	2.9	3 47 51	+31 35 12.43	+10.930	-0.465	1903.91	5	.
183	θ H. Camelopardalis.	5.2	3 48 36	+60 48 57.86	+10.874	-0.627	1905.03	6	.
184	ϵ Persei.	3.0	3 51 8	+39 43 15.87	+10.687	-0.500	1904.30	5	.
185	ξ Persei.	4.0	3 52 28	+35 30 13.05	+10.588	-0.486	1906.12	4	.
186	γ Eridani.	3.2	3 53 22	-13 47 34.96	+10.522	-0.352	1906.47	5	.
187	λ Tauri.	3.3-4.2	3 55 8	+12 12 28.12	+10.389	-0.418	1905.63	4	.
188	τ^9 Eridani.	4.7	3 55 40	-24 17 59.00	+10.350	-0.324	1904.74	6	.
189	ν Tauri.	3.9	3 57 50	+5 42 42.76	+10.187	-0.405	1905.11	4	.
190	A Tauri.	4.5	3 58 47	+21 48 30.92	+10.116	-0.451	1905.01	6	.
191	λ Persei.	4.3	3 59 8	+50 4 47.74	+10.089	-0.565	1905.28	5	.
192	ϕ Tauri.	5.3	4 0 49	+28 43 51.44	+9.961	-0.472	1906.11	4	.
193	c Persei.	4.0	4 1 24	+47 26 44.37	+9.917	-0.555	1904.34	5	.
194	174 G. Eridani.	5.6	4 1 30	-27 55 29.95	+9.910	-0.319	1906.35	4	.
195	43 Tauri.	5.7	4 3 20	+19 20 41.57	+9.770	-0.449	1906.58	4	.
196	p Tauri.	5.6	4 4 44	+26 13 12.05	+9.662	-0.470	1906.72	5	.
197	151 H ¹ . Cephei.	6.7	4 5 6	+85 17 28.81	+9.635	-2.219	1905.60	4	8
198	σ^1 Eridani.	4.1	4 6 59	-7 5 53.27	+9.490	-0.380	1905.58	4	.
199	μ Persei.	4.3	4 7 33	+48 9 19.72	+9.446	-0.569	1905.65	4	.
200	A Eridani.	5.1	4 9 38	-10 30 16.74	+9.285	-0.372	1905.58	4	.
201	μ Tauri.	4.3	4 10 6	+8 38 30.43	+9.249	-0.425	1904.90	5	.
202	σ^2 Eridani.	4.5	4 10 40	-7 48 46.68	+9.205	-0.342	1904.78	7	.
203	54 Persei.	5.1	4 13 55	+34 19 31.46	+8.952	-0.511	1905.65	4	.
204	γ Tauri.	3.9	4 14 6	+15 23 9.88	+8.937	-0.450	1903.60	6	.
205	σ^4 Eridani.	3.6	4 14 7	-34 2 32.28	+8.936	-0.300	1905.51	7	.
206	212 G. Eridani.	5.3	4 16 17	-20 52 41.03	+8.765	-0.347	1906.59	4	.
207	δ Tauri.	3.9	4 17 10	+17 18 29.07	+8.696	-0.458	1905.90	4	.
208	68 Tauri.	4.2	4 19 42	+17 41 56.77	+8.496	-0.462	1905.30	5	.
209	σ^5 Eridani.	4.1	4 20 17	-34 14 55.79	+8.450	-0.302	1905.60	4	.
210	ϵ Tauri.	3.6	4 22 47	+18 57 32.06	+8.251	-0.470	1904.24	6	.
211	ι Camelopardalis.	5.4	4 24 6	+53 41 36.38	+8.145	-0.634	1907.09	2	.
212	80 Tauri.	5.7	4 24 26	+15 25 9.94	+8.119	-0.459	1906.63	4	.
213	m Persei.	6.1	4 26 23	+42 51 1.51	+7.963	-0.567	1905.86	4	.
214	ρ Tauri.	4.8	4 28 10	+14 38 2.99	+7.819	-0.461	1905.42	6	.
215	α Tauri.	1.1	4 30 11	+16 18 29.20	+7.657	-0.467	1903.95	6	.
216	ν Eridani.	4.1	4 31 19	-3 33 24.14	+7.565	-0.408	1905.48	3	.
217	σ^7 Eridani.	3.9	4 31 40	-30 46 1.52	+7.537	-0.317	1904.75	6	.
218	53 Eridani.	4.0	4 33 36	-14 29 57.82	+7.380	-0.374	1904.87	5	.
219	35 B. Camelopardalis.	6.0	4 35 22	+75 45 33.09	+7.236	-1.091	1905.87	4	4
220	258 G. Eridani.	5.6	4 35 57	-24 40 40.28	+7.188	-0.342	1905.10	4	.
221	τ Tauri.	4.3	4 36 15	+22 45 54.71	+7.164	-0.493	1906.57	4	.
222	4 Camelopardalis.	5.4	4 39 40	+56 34 45.88	+6.883	-0.686	1905.60	4	.
223	μ Eridani.	4.2	4 40 30	-3 26 16.55	+6.815	-0.414	1905.65	4	.
224	9 Camelopardalis.	4.4	4 44 6	+66 10 22.96	+6.518	-0.822	1903.95	6	4
225	π^3 Orionis.	3.3	4 44 25	+6 47 12.56	+6.493	-0.456	1905.54	5	.
226	i Tauri.	5.1	4 45 31	+18 40 11.04	+6.400	-0.488	1905.62	4	.
227	π^4 Orionis.	3.8	4 45 53	+5 26 3.59	+6.371	-0.444	1904.62	4	.
228	σ^1 Orionis.	5.2	4 46 52	+14 5 1.63	+6.288	-0.472	1904.44	6	.
229	π^5 Orionis.	3.9	4 49 3	+2 16 37.49	+6.108	-0.436	1905.26	5	.
230	π^1 Orionis.	4.7	4 49 23	+9 59 30.07	+6.079	-0.462	1904.91	5	.
231	ϵ Aurigæ.	2.9	4 50 29	+33 0 28.11	+5.988	-0.546	1906.16	4	.
232	h Tauri.	5.6	4 52 2	+24 53 45.31	+5.858	-0.514	1906.08	4	.
233	57 H ¹ . Camelopardalis.	6.0	4 52 3	+73 55 10.17	+5.857	-1.049	1906.24	4	5
234	10 Camelopardalis.	4.2	4 54 31	+60 17 46.03	+5.650	-0.746	1905.16	4	.
235	ϵ Aurigæ.	3.0-4.5	4 54 48	+43 40 31.84	+5.627	-0.604	1906.15	4	.
236	ζ Aurigæ.	3.9	4 55 20	+40 55 48.10	+5.569	-0.589	1904.35	5	.
237	157 H ¹ . Cephei.	6.5	4 56 18	+85 49 45.90	+5.501	-2.913	1904.58	6	3
238	ϵ Tauri.	4.7	4 57 7	+21 26 49.94	+5.432	-0.506	1905.13	4	.
239	ι Orionis.	4.6	4 58 51	+15 15 53.37	+5.285	-0.484	1903.79	4	.
240	η Aurigæ.	3.3	4 59 30	+41 5 57.24	+5.231	-0.594	1905.67	4	.
241	ϵ Leporis.	3.3	5 1 13	-22 30 19.09	+5.085	-0.360	1906.11	3	.
242	β Eridani.	2.9	5 2 56	-5 12 56.52	+4.940	-0.418	1904.31	5	.
243	λ Eridani.	4.3	5 4 22	-8 52 55.55	+4.819	-0.408	1905.65	4	.
244	19 H. Camelopardalis.	5.2	5 6 4	+79 7 0.38	+4.674	-1.388	1906.08	5	4
245	μ Aurigæ.	4.8	5 6 35	+38 21 57.02	+4.630	-0.583	1905.59	4	.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole:	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
246	μ Leporis.	3.3	5 8 26	-16 19 25.65	+4.472	-0.385	1904.78	6	.
247	α Aurigæ.	0.2	5 9 18	+45 53 46.86	+4.399	-0.633	1901.19	11	.
248	β Orionis.	0.3	5 9 44	-8 19 2.48	+4.362	-0.412	1902.26	8	.
249	λ Aurigæ.	4.8	5 12 6	+40 0 33.12	+4.159	-0.610	1905.62	4	.
250	τ Orionis.	3.7	5 12 45	-6 57 8.62	+4.104	-0.417	1903.82	6	.
251	σ Columbae.	4.9	5 13 53	-34 59 36.30	+4.007	-0.310	1904.54	5	.
252	λ Leporis.	4.3	5 14 58	-13 16 47.61	+3.914	-0.397	1905.12	5	.
253	12 G. Columbae.	5.8	5 15 25	-27 28 17.91	+3.876	-0.343	1906.10	3	.
254	σ Orionis.	4.6	5 16 39	-0 28 52.00	+3.769	-0.440	1905.36	4	.
255	η Orionis* (mean).	3.4	5 19 27	-2 29 20.24	+3.529	-0.434	1905.62	4	.
256	25 Orionis.	4.7	5 19 33	+1 45 17.60	+3.519	-0.448	1904.74	5	.
257	γ Orionis.	1.7	5 19 40	+6 15 32.88	+3.501	-0.463	1905.18	4	.
258	β Tauri.	1.8	5 19 58	+28 31 22.73	+3.484	-0.546	1900.34	17	.
259	17 Camelopardalis.	5.8	5 20 43	+62 59 1.78	+3.419	-0.814	1905.58	4	.
260	β Leporis.	3.0	5 23 58	-20 50 21.10	+3.139	-0.371	1906.14	4	.
261	18 Camelopardalis.	6.5	5 24 0	+57 9 1.54	+3.136	-0.743	1904.31	5	.
262	χ Aurigæ.	4.9	5 26 13	+32 7 5.61	+2.944	-0.564	1904.35	5	.
263	74 B. Camelopardalis.	6.4	5 26 21	+74 58 40.45	+2.933	-1.154	1905.89	4	4
264	δ Orionis.	2.5	5 26 54	-0 22 22.06	+2.885	-0.443	1904.78	5	.
265	19 Camelopardalis.	6.0	5 27 34	+64 5 22.57	+2.827	-0.838	1904.73	5	.
266	α Leporis.	2.7	5 28 19	-17 53 36.60	+2.762	-0.383	1906.19	4	.
267	ϕ^1 Cephei.	4.5	5 29 20	+9 25 19.37	+2.675	-0.477	1905.46	3	.
268	158 H ¹ . Cephei.	6.4	5 29 54	+85 8 49.97	+2.625	-2.704	1905.53	4	6
269	θ^1 Orionis.	5.4	5 30 22	-5 27 20.36	+2.585	-0.427	1905.64	4	.
270	θ^2 Orionis.	5.2	5 30 28	-5 28 54.28	+2.576	-0.427	1906.10	4	.
271	ϵ Orionis.	2.9	5 30 32	-5 58 31.63	+2.570	-0.425	1905.64	4	.
272	22 Camelopardalis.	6.9	5 30 39	+56 18 10.01	+2.561	-0.734	1904.95	6	.
273	ϵ Orionis.	1.8	5 31 8	-1 15 57.19	+2.518	-0.441	1901.02	11	.
274	ζ Tauri.	3.0	5 31 40	+21 4 53.66	+2.472	-0.520	1905.63	4	.
275	σ Orionis.	3.8	5 33 44	-2 39 26.79	+2.293	-0.437	1907.16	2	.
276	23 Camelopardalis.	6.4	5 34 57	+61 25 36.92	+2.187	-0.800	1904.61	6	.
277	ζ Orionis*.	2.0	5 35 43	-1 59 43.80	+2.120	-0.440	1904.82	6	.
278	α Columbae.	2.8	5 36 2	-34 7 37.13	+2.093	-0.316	1906.17	4	.
279	σ Aurigæ.	5.5	5 38 9	+49 46 57.70	+1.908	-0.675	1906.12	4	.
280	γ Leporis.	3.8	5 40 18	-22 28 53.35	+1.722	-0.361	1905.14	4	.
281	130 Tauri.	5.5	5 41 36	+17 41 30.08	+1.607	-0.509	1905.48	3	.
282	ζ Leporis.	3.7	5 42 25	-14 51 32.52	+1.536	-0.396	1905.14	4	.
283	κ Orionis.	2.2	5 43 1	-9 42 17.99	+1.484	-0.414	1905.95	5	.
284	ν Aurigæ.	4.2	5 44 34	+39 7 9.95	+1.350	-0.605	1905.11	4	.
285	ξ Aurigæ.	4.9	5 46 28	+55 41 1.67	+1.183	-0.734	1904.82	7	.
286	δ Leporis.	3.9	5 47 1	-20 53 17.95	+1.135	-0.378	1906.41	3	.
287	α Orionis.	0.9	5 49 45	+7 23 18.43	+0.896	-0.474	1903.26	8	.
288	δ Aurigæ.	3.9	5 51 18	+54 16 36.43	+0.761	-0.722	1905.68	4	.
289	139 Tauri.	4.9	5 51 47	+25 56 20.45	+0.718	-0.543	1904.79	6	.
290	η Leporis.	3.8	5 51 51	-14 11 7.87	+0.713	-0.398	1905.66	4	.
291	99 B. Camelopardalis.	6.0†	5 51 56	+66 53 34.86	+0.705	-0.904	1905.15	7	.
292	β Aurigæ.	2.1	5 52 12	+44 56 14.96	+0.683	-0.641	1904.68	5	.
293	θ Aurigæ.	2.7	5 52 54	+37 12 20.14	+0.621	-0.597	1901.09	11	.
294	μ Orionis.	4.2	5 56 53	+9 38 50.46	+0.273	-0.482	1904.53	5	.
295	1 Geminorum.	4.3	5 58 2	+23 16 7.20	+0.171	-0.532	1904.76	6	.
296	66 Orionis.	5.7	5 59 41	+4 0 52.07	+0.027	-0.462	1906.13	3	.
297	ν Orionis.	4.4	6 1 52	+14 46 40.42	-0.163	-0.500	1903.96	5	.
298	74 G. Columbae.	5.7	6 2 15	-20 44 50.95	-0.196	-0.337	1904.79	6	.
299	36 Camelopardalis.	5.4	6 2 47	+65 44 18.03	-0.244	-0.880	1905.22	2	2
300	ξ Orionis.	4.4	6 6 15	+14 13 52.41	-0.547	-0.498	1905.15	5	.
301	22 H. Camelopardalis.	4.7	6 7 50	+69 21 17.88	-0.685	-0.964	1906.01	4	4
302	Groombridge 1004.	6.6	6 8 3	+86 45 35.20	-0.703	-3.894	1904.78	5	3
303	η Geminorum.	3.2-4.2	6 8 51	+22 32 9.13	-0.773	-0.527	1904.76	5	.
304	2 Lynx.	4.4	6 10 48	+50 2 40.85	-0.944	-0.772	1907.13	2	.
305	k Orionis.	5.1	6 10 50	+12 18 1.26	-0.947	-0.491	1904.44	6	.

† 291. Double, $\mu^m = 4^m 59.1^s 1.5^s$, assumed that brighter star was observed, see p. 1X.
 † 291. Magnitude from Newcomb's Suggested List of Fundamental Stars.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
306	7	5.1	<i>h m s</i> 6 14 54	<i>° ' "</i> - 7 46 51.35	"	"	1904.47	6	
307	7	3.1	6 16 28	-30 1 7.65	-1.302	-0.420	1904.86	6	
308	μ	3.2	6 16 55	+22 33 53.08	-1.440	-0.334	1904.39	5	
309	δ ¹	5.1	6 17 12	+49 20 20.54	-1.478	-0.528	1903.90	4	
310	β	2.0	6 18 18	-17 54 21.46	-1.503	-0.672	1906.19	4	
311	8	4.5	6 18 28	+ 4 38 38.01	-1.599	-0.383	1905.67	4	
312	6	6.0	6 22 6	+58 14 7.96	-1.614	-0.461	1904.92	5	
313	10	5.0	6 23 1	- 4 42 1.35	-1.930	-0.757	1906.17	2	
314	ν	4.1	6 23 2	+20 16 32.44	-2.010	-0.429	1903.08	6	
315	λ	4.5	6 24 28	-32 31 0.62	-2.011	-0.516	1905.54	5	
316	13	4.5	6 27 30	+ 7 24 22.01	-2.136	-0.321	1904.28	7	
317	8	6.0	6 28 33	+61 34 7.21	-2.399	-0.469	1905.66	4	
318	23 H.	5.6	6 29 10	+79 40 18.99	-2.491	-0.790	1905.40	6	4
319	ε ²	4.5	6 30 52	-22 53 7.42	-2.545	-1.489	1906.17	4	
320	51	5.7	6 31 44	+39 28 44.22	-2.692	-0.362	1905.67	4	
321	γ	1.9	6 31 56	+16 29 5.52	-2.767	-0.599	1903.05	7	
322	S	4.7	6 35 28	+ 9 59 17.96	-3.090	-0.500	1905.13	4	
323	e	3.2	6 37 47	+25 13 48.11	-3.290	-0.475	1905.18	4	
324	φ ⁵	5.3	6 39 32	+43 40 38.61	-3.441	-0.530	1905.65	4	
325	ε	3.4	6 39 41	+13 0 11.35	-3.441	-0.621	1905.66	4	
326	α	1.6	6 40 44	-16 34 46.55	-3.453	-0.481	1902.48	8	
327	18	4.7	6 42 39	+ 2 31 17.90	-3.545	-0.374	1905.65	4	
328	43	5.1	6 42 55	+69 0 16.51	-3.709	-0.446	1905.37	6	7
329	φ ¹	5.0	6 43 42	+41 53 55.54	-3.733	-0.929	1905.67	4	
330	24 H.	4.8	6 45 29	+77 6 18.03	-3.799	-0.605	1904.56	4	2
331	κ	3.8	6 46 6	-32 23 33.55	-3.953	-1.261	1904.59	7	
332	θ	3.6	6 46 12	+34 4 54.66	-4.006	-0.318	1904.78	5	
333	15	4.5	6 48 37	+58 33 13.39	-4.014	-0.564	1905.15	4	
334	e	4.0	6 49 0	+13 18 17.34	-4.221	-0.741	1905.41	4	
335	θ	4.2	6 49 33	-11 54 47.16	-4.254	-0.482	1905.67	4	
336	ι	4.4	6 51 41	-16 55 27.98	-4.300	-0.394	1905.17	5	
337	51 H.	5.3	6 53 44	+87 12 20.30	-4.482	-0.377	1903.54	17	14
338	105 G.	5.7	6 54 30	-25 16 42.06	-4.657	-4.194	1904.48	6	
339	e	1.6	6 54 42	-28 50 9.00	-4.722	-0.346	1906.20	4	
340	h	6.0	6 57 9	+29 30 14.12	-4.739	-0.332	1904.50	6	
341	22	3.7	6 57 44	-27 47 29.77	-4.948	-0.539	1905.17	6	
342	ζ	3.7-4.3	6 58 11	+20 43 1.06	-5.034	-0.335	1905.72	4	
343	o ²	3.1	6 58 51	-23 41 14.28	-5.091	-0.500	1906.19	4	
344	γ	4.1	6 59 14	-15 29 7.49	-5.124	-0.351	1905.17	4	
345	45	5.6	7 2 38	+16 5 25.49	-5.124	-0.380	1904.56	5	
346	δ	2.0	7 4 19	-26 14 3.35	-5.410	-0.481	1906.19	4	
347	63	5.1	7 4 47	+39 29 2.09	-5.553	-0.339	1905.16	4	
348		6.2	7 6 24	+81 26 21.42	-5.591	-0.577	1902.79	2	2
349	22	4.1	7 6 45	- 0 19 37.16	-5.727	-1.617	1904.85	6	
350	18	5.3	7 7 11	+59 48 55.54	-5.757	-0.426	1904.85	6	
351	51	5.3	7 7 38	+16 19 43.24	-5.793	-0.730	1905.18	6	
352	25 H.	5.1	7 10 4	+82 36 16.06	-5.830	-0.479	1905.13	8	10
353	64	5.8	7 11 5	+41 3 39.32	-6.033	-1.793	1905.20	4	
354	λ	3.6	7 12 21	+16 43 14.19	-6.119	-0.578	1906.19	4	
355	δ	3.5	7 14 9	+22 9 59.49	-6.224	-0.475	1905.70	4	
356	29	4.9	7 14 31	-24 22 33.31	-6.374	-0.493	1904.61	7	
357	19	5.6	7 14 43	+55 28 12.29	-6.403	-0.342	1905.65	4	
358		6.5	7 16 27	+81 5 59.21	-6.420	-0.676	1902.79	2	2
359	66	5.3	7 17 13	+40 51 53.74	-6.564	-1.532	1905.19	4	
360	ι	3.9	7 19 31	+27 59 48.81	-6.627	-0.570	1905.21	4	
361	η	2.4	7 20 8	-29 6 28.49	-6.817	-0.508	1905.60	5	
362	143 B.	5.8	7 20 29	+68 40 12.20	-6.868	-0.322	1905.80	4	4
363	β	3.1	7 21 44	+ 8 29 26.89	-6.896	-0.858	1904.43	5	
364	ρ	4.2	7 22 41	+31 59 1.00	-6.998	-0.441	1905.18	4	
365	6	4.8	7 24 14	+12 12 47.77	-7.076	-0.526	1904.53	6	
366	α	2.0	7 28 13	+32 6 28.52	-7.203	-0.452	1905.75	4	
367	ν	4.2	7 29 46	+27 7 5.07	-7.528	-0.513	1905.43	5	
368	108 G.	4.5	7 29 46	-22 4 47.25	-7.652	-0.495	1905.71	4	
369	n ¹	5.9	7 30 5	-23 15 20.31	-7.653	-0.342	1905.52	3	
370	25	5.2	7 32 18	- 3 53 15.00	-7.678	-0.337	1905.68	4	

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371	<i>o</i> Geminorum.....	4.9	7 32 38	+34 48 49.22	-7.884	-0.522	1905.11	8	..
372	<i>f</i> Puppis.....	4.6	7 33 40	-34 44 35.86	-7.967	-0.293	1905.10	6	..
373	α Canis Minoris.....	0.5	7 34 4	+5 28 49.24	-7.999	-0.411	1903.92	6	..
374	24 Lynceis.....	5.0	7 34 33	+58 56 40.10	-8.038	-0.677	1905.71	4	..
375	26 Monocerotis.....	4.1	7 36 28	-9 19 4.12	-8.191	-0.377	1904.80	5	..
376	κ Geminorum.....	3.7	7 38 25	+24 38 16.10	-8.346	-0.477	1905.74	4	..
377	β Geminorum.....	1.2	7 39 12	+28 16 4.20	-8.408	-0.477	1904.84	5	..
378	<i>l</i> Puppis.....	4.1	7 39 48	-28 42 55.72	-8.456	-0.314	1904.65	7	..
379	π Geminorum.....	5.3	7 41 4	+33 39 40.41	-8.556	-0.508	1905.68	4	..
380	4 Puppis.....	5.1	7 41 21	-14 19 14.31	-8.578	-0.360	1904.60	5	..
381	ξ Argus.....	3.5	7 45 5	-24 36 30.85	-8.873	-0.326	1904.61	5	..
382	9 Puppis.....	5.3	7 47 8	-13 37 59.13	-9.034	-0.357	1904.86	6	..
383	ϕ Geminorum.....	5.0	7 47 23	+27 1 28.59	-9.053	-0.474	1903.89	6	..
384	26 Lynceis.....	5.7	7 47 26	+47 49 26.56	-9.057	-0.566	1904.81	5	..
385	166 B. Camelopardalis.....	5.0	7 48 14	+74 11 6.77	-9.119	-0.940	1903.72	4	4
386	1 Cancri.....	6.0	7 51 19	+16 3 26.17	-9.358	-0.435	1905.21	6	..
387	53 Camelopardalis.....	6.0	7 53 10	+60 35 52.50	-9.502	-0.658	1905.71	4	..
388	ω^1 Cancri.....	5.9	7 54 53	+25 39 59.47	-9.933	-0.461	1903.98	5	..
389	3 Cancri.....	5.8	7 55 4	+17 34 58.93	-9.647	-0.436	1904.98	8	..
390	χ Geminorum.....	5.0	7 57 23	+28 4 28.75	-9.824	-0.465	1905.22	4	..
391	4 B. Ursæ Minoris.....	7.0	7 58 3	+88 55 59.23	-9.875	-8.296	1904.12	9	7
392	27 Lynceis.....	4.9	8 0 56	+51 47 42.19	-10.004	-0.567	1906.21	3	..
393	μ Cancri.....	5.4	8 1 53	+21 52 19.31	-10.166	-0.440	1904.65	7	..
394	3 H. Ursæ Majoris.....	5.5	8 2 52	+68 46 6.99	-10.240	-0.751	1904.12	8	5
395	ρ Argus.....	2.9	8 3 17	-24 0 56.87	-10.271	-0.315	1905.23	6	..
396	ψ Cancri.....	5.8	8 4 26	+25 48 38.45	-10.357	-0.447	1904.11	8	..
397	Groombridge 1391.....	6.2	8 5 13	+82 44 26.57	-10.415	-1.404	1903.85	2	2
398	τ Cancri*.....	5.1	8 6 29	+17 56 56.43	-10.510	-0.424	1904.42	5	..
399	173 B. Camelopardalis.....	5.7	8 6 59	+76 3 44.40	-10.548	-0.946	1905.45	6	4
400	20 Puppis.....	5.0	8 8 44	-15 29 12.39	-10.678	-0.336	1905.22	4	..
401	β Cancri.....	3.8	8 11 6	+9 29 37.74	-10.852	-0.394	1903.91	6	..
402	58 Camelopardalis.....	5.9	8 12 22	+58 3 17.21	-10.945	-0.592	1904.34	9	..
403	λ Cancri.....	5.2	8 13 59	+27 32 27.80	-11.064	-0.439	1904.50	7	..
404	31 Lynceis.....	4.4	8 16 0	+43 30 32.10	-11.210	-0.494	1905.74	4	..
405	δ^1 Cancri.....	5.9	8 17 38	+18 39 12.79	-11.329	-0.409	1904.23	8	..
406	30 Monocerotis.....	4.0	8 20 40	-3 34 49.17	-11.546	-0.352	1902.95	7	..
407	ν Ursæ Majoris.....	3.5	8 21 58	+61 3 8.33	-11.638	-0.589	1905.76	4	..
408	29 Cancri.....	5.9	8 23 3	+14 32 30.65	-11.716	-0.392	1904.47	8	..
409	Groombridge 1418.....	7.4	8 25 21	+85 24 28.59	-11.878	-1.911	1904.65	7	10
410	θ Cancri.....	5.6	8 25 54	+18 25 56.88	-11.917	-0.396	1904.67	7	..
411	110 B. Lynceis.....	6.0	8 26 25	+38 21 32.51	-11.954	-0.452	1906.23	4	..
412	η Cancri.....	5.5	8 26 56	+20 46 51.11	-11.990	-0.401	1903.07	5	..
413	181 B. Camelopardalis.....	6.3	8 28 36	+73 58 45.56	-12.106	-0.782	1904.64	5	2
414	27 B. Ursæ Majoris.....	6.0	8 31 53	+53 3 43.29	-12.334	-0.508	1905.23	4	..
415	δ Hydræ.....	4.2	8 32 22	+6 3 8.44	-12.367	-0.359	1905.24	5	..
416	σ Hydræ.....	4.5	8 33 32	+3 41 33.19	-12.447	-0.353	1902.74	8	..
417	19 G. Pyxidis.....	5.1	8 34 45	-22 19 15.76	-12.531	-0.291	1905.62	5	..
418	6 Hydræ.....	5.2	8 35 17	-12 7 18.71	-12.567	-0.316	1904.84	5	..
419	β Pyxidis.....	4.0	8 36 11	-34 57 12.01	-12.629	-0.260	1904.80	6	..
420	γ Cancri.....	4.7	8 37 30	+21 49 41.97	-12.718	-0.385	1905.75	4	..
421	δ Cancri.....	4.2	8 39 0	+18 31 17.66	-12.819	-0.377	1905.77	4	..
422	α Mali.....	3.7	8 39 34	32 49 33.11	-12.857	-0.264	1904.49	9	..
423	ϵ Cancri.....	4.2	8 40 39	+29 7 32.98	-12.929	-0.400	1905.74	4	..
424	ϵ Hydræ.....	3.5	8 41 29	+6 47 8.59	-12.985	-0.346	1904.86	5	..
425	14 Hydræ.....	5.2	8 44 20	-3 4 18.89	-13.174	-0.326	1904.57	6	..
426	B. D. +83° 233.....	7.1	8 44 31	+83 7 37.32	-13.186	-1.249	1903.86	1	2
427	γ Pyxidis.....	4.2	8 46 17	-27 20 19.64	-13.322	-0.271	1905.23	6	..
428	ρ^1 Cancri.....	6.1	8 46 39	+28 42 44.96	-13.326	-0.381	1904.84	5	..
429	σ^2 Cancri* (mean).....	5.6	8 48 9	+30 57 29.56	-13.423	-0.392	1906.05	5	..
430	τ Hydræ.....	3.3	8 50 7	+6 19 34.55	-13.550	-0.336	1905.27	4	..
431	60 Cancri.....	5.7	8 50 28	+12 0 29.42	-13.574	-0.347	1904.87	5	..
432	ϵ Ursæ Majoris.....	3.1	8 52 22	+48 26 3.48	-13.605	-0.429	1902.76	8	..
433	α Cancri.....	4.3	8 53 1	+12 14 41.43	-13.737	-0.343	1905.77	4	..
434	ρ Ursæ Majoris.....	5.0	8 53 32	+68 1 10.11	-13.770	-0.574	1905.42	6	4
435	10 Ursæ Majoris.....	4.1	8 54 9	+42 10 42.62	-13.809	-0.403	1906.47	5	..

428. Triple, α^m 6.6^m, 1.1^m, binary 60 years, α^m 6-6^m, 5^m, 110°, assumed that mean of close double was observed.
 429. Double, δ^m 10.6^m, 6.1^m, 4.325°.

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436	Groombridge 1480.	6.5	8 56 18	+81 13 46.28	-13.944	-0.968	1903.85	3	4
437	44 B. Ursæ Majoris.	5.7	8 56 41	+54 40 41.34	-13.960	-0.457	1905.25	4	..
438	κ Ursæ Majoris.	3.7	8 56 48	+47 33 7.36	-13.976	-0.424	1906.27	4	..
439	ν Cancrī.	5.4	8 56 54	+24 50 47.32	-13.982	-0.361	1904.72	8	..
440	145 B. Lynceis.	4.7	9 0 10	+38 51 7.58	-14.186	-0.388	1905.29	4	..
441	ω Hydræ.	5.4	9 0 43	+5 29 31.48	-14.219	-0.319	1904.60	6	..
442	σ² Ursæ Majoris.	4.9	9 1 36	+67 32 25.77	-14.274	-0.541	1904.81	5	5
443	κ Cancrī.	5.1	9 2 20	+11 4 14.50	-14.319	-0.326	1903.25	7	..
444	ξ Cancrī.	5.2	9 3 37	+22 27 0.35	-14.397	-0.345	1904.88	5	..
445	36 Lynceis.	5.3	9 7 16	+43 37 48.21	-14.618	-0.387	1905.73	1	..
446	θ Hydræ.	3.8	9 9 10	+2 44 8.67	-14.730	-0.304	1903.61	6	..
447	38 Lynceis*.	4.0	9 12 37	+37 13 32.13	-14.934	-0.358	1905.28	4	..
448	83 Cancrī.	6.6	9 13 24	+18 7 45.25	-14.980	-0.318	1905.26	4	..
449	40 Lynceis.	3.3	9 14 58	+34 48 56.00	-15.070	-0.344	1902.26	7	..
450	h Mali.	4.9	9 17 4	-25 32 22.65	-15.190	-0.245	1905.06	11	..
451	28 Hydræ.	5.8	9 20 24	-4 41 10.20	-15.379	-0.274	1904.52	8	..
452	α Hydræ.	2.2	9 22 40	-8 13 29.09	-15.506	-0.266	1905.75	4	..
453	1 H. Draconis.	4.6	9 22 51	+81 46 6.79	-15.516	-0.816	1904.84	4	10
454	h Ursæ Majoris.	3.8	9 23 39	+63 29 57.88	-15.560	-0.434	1905.75	8	..
455	d Ursæ Majoris.	4.6	9 25 39	+70 16 12.58	-15.670	-0.482	1905.16	6	4
456	θ Ursæ Majoris.	3.3	9 26 10	+52 7 56.97	-15.698	-0.351	1905.79	4	..
457	ξ Leonis.	5.1	9 26 33	+11 44 33.08	-15.719	-0.286	1905.01	4	..
458	10 Leonis Minoris.	4.6	9 28 6	+36 50 29.71	-15.802	-0.324	1905.79	4	..
459	160 G. Hydræ.	5.2	9 28 36	-20 40 23.02	-15.830	-0.240	1905.27	5	..
460	A Hydræ.	5.7	9 29 33	-5 28 6.92	-15.880	-0.260	1904.94	6	..
461	10 Leonis.	5.1	9 31 56	+7 17 2.96	-16.006	-0.271	1904.91	6	..
462	2 Sextantis.	4.8	9 33 14	+5 6 2.65	-16.075	-0.265	1905.27	5	..
463	89 B. Ursæ Majoris.	5.7	9 33 42	+69 41 33.68	-16.099	-0.444	1905.89	4	4
464	ι Hydræ.	4.1	9 34 45	-0 41 19.66	-16.154	-0.258	1905.25	5	..
465	κ Hydræ.	5.0	9 35 31	-13 52 42.51	-16.193	-0.240	1904.89	5	..
466	o Leonis.	3.8	9 35 49	+10 20 50.28	-16.209	-0.267	1902.53	8	..
467	ψ Leonis.	5.6	9 38 17	+14 28 45.19	-16.335	-0.270	1904.88	5	..
468	θ Antliæ.	5.0	9 39 45	-27 18 41.61	-16.409	-0.216	1905.26	5	..
469	ε Leonis.	3.1	9 40 11	+24 14 4.65	-16.430	-0.278	1904.89	5	..
470	14 Leonis Minoris.	6.8	9 40 19	+45 34 43.55	-16.437	-0.316	1905.28	5	..
471	ν Ursæ Majoris.	3.9	9 43 53	+59 30 31.96	-16.614	-0.341	1905.79	4	..
472	23 Leonis.	6.7	9 45 37	+13 32 1.43	-16.698	-0.255	1904.38	9	..
473	6 Sextantis.	6.0	9 46 12	-3 46 29.76	-16.726	-0.236	1905.28	4	..
474	μ Leonis.	4.1	9 47 5	+26 28 40.86	-16.769	-0.265	1904.49	5	..
475	109 B. Ursæ Majoris.	6.0	9 49 27	+73 21 18.15	-16.881	-0.421	1905.88	4	4
476	83 B. Leonis.	5.9	9 51 8	+9 24 25.58	-16.960	-0.239	1904.41	7	..
477	19 Leonis Minoris.	5.2	9 51 34	+41 31 54.70	-16.980	-0.278	1904.15	7	..
478	ν Leonis.	5.2	9 52 51	+12 55 18.69	-17.040	-0.241	1904.95	6	..
479	π Leonis.	4.9	9 54 56	+8 31 26.32	-17.135	-0.233	1906.30	6	..
480	193 G. Hydræ.	5.8	9 59 44	-23 48 5.07	-17.349	-0.194	1905.28	9	..
481	ν² Hydræ.	4.7	10 0 15	-12 34 46.61	-17.372	-0.205	1904.41	7	..
482	η Leonis.	3.6	10 1 53	+17 15 1.05	-17.443	-0.228	1905.78	4	..
483	α Leonis.	1.3	10 3 3	+12 27 22.25	-17.493	-0.219	1902.55	8	..
484	λ Hydræ.	3.8	10 5 43	-11 51 35.55	-17.606	-0.195	1905.29	4	..
485	32 Ursæ Majoris.	5.7	10 10 47	+65 36 26.58	-17.813	-0.286	1905.92	4	4
486	λ Ursæ Majoris.	3.5	10 11 4	+43 24 49.06	-17.825	-0.234	1906.31	4	..
487	ζ Leonis.	3.6	10 11 8	+23 54 56.11	-17.827	-0.216	1906.28	4	..
488	22 Sextantis.	5.4	10 12 40	-7 34 9.90	-17.888	-0.188	1904.62	6	..
489	138 B. Ursæ Majoris.	6.2	10 14 3	+54 43 7.02	-17.943	-0.247	1904.62	6	..
490	γ Leonis (<i>rst star</i>).	2.6	10 14 28	+20 20 50.49	-17.958	-0.208	1903.09	9	..
491	29 H. Camelopardalis.	5.6	10 15 9	+84 45 36.65	-17.985	-0.592	1904.32	6	3
492	μ Ursæ Majoris.	3.2	10 16 22	+42 0 9.69	-18.032	-0.220	1905.76	4	..
493	42 Leonis.	6.1	10 16 28	+15 28 47.35	-18.036	-0.198	1904.62	6	..
494	30 H. Ursæ Majoris.	4.9	10 16 56	+66 4 19.55	-18.054	-0.270	1905.88	4	4
495	30 H. Camelopardalis.	5.3	10 18 55	+83 4 2.68	-18.128	-0.470	1904.94	4	5
496	μ Hydræ.	4.1	10 21 15	-16 19 32.68	-18.215	-0.168	1904.89	5	..
497	31 Leonis Minoris.	4.4	10 22 6	+37 13 10.25	-18.246	-0.202	1904.01	5	..
498	α Antliæ.	4.4	10 22 35	-30 33 31.16	-18.263	-0.157	1905.30	4	..
499	36 Ursæ Majoris.	4.8	10 24 14	+56 29 36.76	-18.322	-0.220	1905.82	4	..
500	29 Sextantis.	5.2	10 24 24	-2 13 38.22	-18.328	-0.172	1905.63	3	..

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501	9 H. Draconis.....	5.0	10 26 30	+76 13 41.26	-18.405	-0.294	1904.77	7	0
502	<i>p</i> Leonis.....	3.8	10 27 33	+9 49 16.75	-18.438	-0.173	1905.81	4	
503	37 Ursæ Majoris.....	5.2	10 28 43	+57 35 52.18	-18.478	-0.213	1905.80	4	
504	44 Hydræ.....	5.3	10 29 15	-23 13 46.93	-18.496	-0.152	1904.44	7	
505	48 Leonis.....	5.2	10 29 35	+7 28 7.57	-18.507	-0.167	1905.29	6	
506	37 Leonis Minoris.....	4.8	10 33 6	+32 29 44.53	-18.623	-0.175	1905.30	7	
507	35 H. Ursæ Majoris.....	5.2	10 35 55	+69 35 57.97	-18.713	-0.220	1905.06	5	4
508	33 Sextantis.....	6.4	10 36 19	-1 12 57.75	-18.725	-0.150	1905.26	4	
509	39 Ursæ Majoris.....	5.8	10 37 25	+57 43 26.57	-18.759	-0.188	1904.83	6	
510	34 Sextantis.....	6.6	10 37 28	+4 6 20.25	-18.761	-0.151	1905.29	6	
511	41 Leonis Minoris.....	5.0	10 37 59	+23 42 42.80	-18.777	-0.159	1903.29	7	
512	42 Leonis Minoris.....	5.4	10 40 18	+31 12 32.50	-18.847	-0.158	1905.86	4	
513	37 Sextantis.....	6.3	10 40 53	+6 54 0.32	-18.864	-0.146	1904.42	7	
514	<i>l</i> Leonis.....	5.3	10 44 0	+11 4 27.75	-18.955	-0.142	1903.77	7	
515	<i>v</i> Hydræ.....	3.3	10 44 41	-15 40 11.37	-18.974	-0.131	1905.85	4	
516	46 Leonis Minoris.....	3.9	10 47 43	+34 45 13.24	-19.058	-0.144	1902.73	7	
517	54 Leonis.....	4.5	10 50 12	+25 16 59.00	-19.124	-0.134	1904.91	10	
518	6 H ¹ . Draconis.....	6.3	10 51 58	+78 18 22.33	-19.170	-0.201	1903.64	3	2
519	47 Ursæ Majoris.....	5.1	10 53 52	+40 57 52.94	-19.218	-0.131	1905.36	4	
520	<i>α</i> Crateris.....	4.2	10 54 54	-17 45 57.68	-19.244	-0.110	1904.46	7	
521	<i>d</i> Leonis.....	5.0	10 55 24	+4 9 16.70	-19.256	-0.118	1904.34	8	
522	<i>β</i> Ursæ Majoris.....	2.4	10 55 49	+56 55 6.81	-19.266	-0.139	1905.83	4	
523	<i>α</i> Ursæ Majoris.....	2.0	10 57 34	+62 17 27.35	-19.307	-0.138	1903.07	7	
524	<i>χ</i> Leonis.....	4.7	10 59 52	+7 52 35.11	-19.360	-0.108	1905.64	3	
525	<i>χ</i> Hydræ.....	5.1	11 0 31	-26 45 13.31	-19.375	-0.099	1905.12	10	
526	<i>p</i> ⁴ Leonis.....	5.7	11 1 48	+2 29 53.72	-19.404	-0.103	1903.51	5	
527	<i>φ</i> Ursæ Majoris.....	3.2	11 4 3	+45 2 27.97	-19.452	-0.111	1904.53	5	
528	<i>β</i> Crateris.....	4.5	11 6 44	-22 16 47.71	-19.508	-0.091	1905.49	7	
529	<i>δ</i> Leonis.....	2.6	11 8 47	+21 4 17.33	-19.548	-0.095	1904.54	5	
530	<i>θ</i> Leonis.....	3.4	11 9 0	+15 58 34.26	-19.552	-0.093	1905.37	4	
531	<i>n</i> Leonis.....	5.5	11 10 38	+13 51 11.45	-19.584	-0.090	1904.21	9	
532	237 B. Ursæ Majoris.....	6.0	11 11 4	+50 1 19.54	-19.592	-0.096	1905.34	4	
533	<i>φ</i> Leonis.....	4.6	11 11 35	-3 6 17.59	-19.601	-0.085	1904.16	12	
534	<i>ε</i> Ursæ Majoris* (mean).....	3.9	11 12 51	+32 5 26.99	-19.624	-0.086	1905.81	4	
535	<i>v</i> Ursæ Majoris.....	3.7	11 13 5	+33 38 24.09	-19.628	-0.088	1903.36	8	
536	<i>δ</i> Crateris.....	3.8	11 14 20	-14 14 12.89	-19.650	-0.078	1905.32	4	
537	<i>σ</i> Leonis.....	4.1	11 15 59	+6 34 38.12	-19.678	-0.078	1906.33	4	
538	249 B. Ursæ Majoris.....	6.0	11 16 55	+64 52 41.19	-19.694	-0.090	1904.96	2	2
539	<i>ι</i> Leonis.....	4.0	11 18 43	+11 4 47.72	-19.722	-0.074	1905.88	4	
540	<i>γ</i> Crateris.....	4.1	11 19 53	-17 8 4.70	-19.740	-0.068	1905.77	5	
541	83 Leonis.....	6.2	11 21 42	+3 33 29.48	-19.767	-0.064	1904.25	12	
542	<i>τ</i> Leonis.....	5.2	11 22 48	+3 24 24.95	-19.783	-0.064	1903.59	8	
543	58 Ursæ Majoris.....	5.9	11 25 7	+43 43 20.44	-19.815	-0.064	1905.82	4	
544	<i>η</i> Leonis.....	5.1	11 25 12	-2 27 6.03	-19.816	-0.059	1904.00	12	
545	<i>λ</i> Draconis.....	4.1	11 25 28	+69 52 59.11	-19.820	-0.070	1904.94	4	4
546	<i>ε</i> Hydræ.....	3.7	11 28 5	-31 18 15.96	-19.853	-0.051	1906.52	6	
547	<i>υ</i> Leonis.....	4.5	11 31 50	-0 16 17.53	-19.896	-0.046	1902.35	8	
548	<i>ο</i> Hydræ.....	4.9	11 35 15	-34 11 25.02	-19.930	-0.038	1905.11	9	
549	3 Draconis.....	5.5	11 36 54	+67 17 54.68	-19.945	-0.041	1905.95	4	4
550	<i>ζ</i> Crateris.....	4.9	11 39 42	-17 47 40.84	-19.968	-0.031	1904.24	9	
551	<i>ν</i> Virginis.....	4.2	11 40 43	+7 5 22.34	-19.976	-0.029	1904.46	9	
552	<i>χ</i> Ursæ Majoris.....	3.8	11 40 46	+48 20 2.08	-19.976	-0.030	1903.69	6	
553	298 G. Hydræ.....	5.4	11 43 42	-26 11 36.45	-19.996	-0.023	1904.36	8	
554	<i>θ</i> Leonis.....	2.2	11 43 58	+15 7 51.94	-19.998	-0.022	1903.09	7	
555	<i>β</i> Virginis.....	3.8	11 45 29	+2 19 40.54	-20.007	-0.021	1905.83	4	
556	Groombridge 1830.....	6.5	11 47 13	+38 25 37.04	-20.016	-0.029	1905.65	3	
557	<i>γ</i> Ursæ Majoris.....	2.5	11 48 34	+54 15 2.46	-20.022	-0.015	1904.64	4	
558	<i>η</i> Leonis.....	5.5	11 50 32	+16 12 12.02	-20.030	-0.010	1904.27	11	
559	<i>δ</i> Virginis.....	5.2	11 54 50	+4 12 43.32	-20.042	-0.002	1903.84	10	
560	<i>π</i> Virginis.....	4.6	11 55 45	+7 10 18.98	-20.043	0.000	1903.06	7	
561	128 H ¹ . Camelopardalis.....	6.4	11 59 43	+86 8 29.18	-20.047	+0.008	1903.80	10	2
562	<i>ο</i> Virginis.....	4.2	12 0 7	+9 17 18.90	-20.047	+0.009	1903.21	8	
563	14 H ¹ . Draconis.....	6.0	12 0 10	+77 27 53.98	-20.047	+0.009	1905.63	3	
564	10 Virginis.....	6.1	12 4 34	+2 27 33.57	-20.043	+0.018	1904.36	13	
565	<i>ε</i> Corvi.....	3.2	12 4 59	-22 3 47.93	-20.042	+0.018	1904.62	8	

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566	4 H.	Draconis.....	5.1	12 7 31	+78 10 19.29	-20.036	+0.022	1904.19	4	2
567	1	Canum Venaticorum.....	6.3	12 9 46	+53 59 28.29	-20.029	+0.027	1904.55	11	.
568	δ	Ursæ Majoris.....	3.4	12 10 29	+57 35 17.83	-20.026	+0.028	1905.82	4	.
569	γ	Corvi.....	2.8	12 10 40	-16 59 10.80	-20.025	+0.029	1905.39	7	.
570	2	Canum Venaticorum.....	5.8	12 11 7	+41 13 0.73	-20.023	+0.030	1904.14	5	.
571	5 B.	Ursæ Minoris.....	6.3	12 13 56	+86 59 29.49	-20.010	+0.027	1904.81	8	2
572	6 B.	Ursæ Minoris.....	6.3	12 14 23	+88 15 15.34	-20.007	+0.010	1905.20	5	3
573	η	Virginis.....	4.0	12 14 47	-0 6 40.02	-20.005	+0.037	1903.70	6	.
574	ε	Virginis.....	5.1	12 15 16	+3 52 9.66	-20.002	+0.038	1904.51	7	.
575	12	Comæ Berenices.....	4.8	12 17 29	+26 24 3.10	-19.989	+0.042	1905.38	5	.
576	x ²	Centauri.....	5.8	12 20 5	-34 37 56.09	-19.970	+0.049	1906.38	4	.
577	6	Canum Venaticorum.....	5.2	12 20 55	+39 34 23.96	-19.963	+0.048	1906.40	4	.
578	14	Comæ Berenices.....	5.2	12 21 24	+27 49 20.17	-19.960	+0.049	1904.68	6	.
579	323 G.	Hydræ.....	5.7	12 21 35	-32 16 32.60	-19.958	+0.052	1905.85	4	.
580	15	Comæ Berenices.....	4.6	12 21 57	+28 49 27.24	-19.955	+0.050	1905.02	6	.
581	33 H ¹ .	Virginis.....	6.0	12 22 44	-4 3 42.70	-19.948	+0.053	1904.98	5	.
582	δ	Corvi.....	3.1	12 24 41	-15 57 31.10	-19.931	+0.057	1903.70	6	.
583	20	Comæ Berenices.....	5.7	12 24 42	+21 26 59.31	-19.930	+0.050	1904.51	7	.
584	74	Ursæ Majoris.....	5.4	12 25 17	+58 57 21.83	-19.925	+0.054	1905.88	4	.
585	8	Canum Venaticorum.....	4.3	12 29 0	+41 54 3.83	-19.887	+0.060	1902.83	7	.
586	β	Corvi.....	2.8	12 29 8	-22 50 37.36	-19.885	+0.067	1904.95	5	.
587	κ	Draconis.....	3.9	12 29 13	+70 20 21.96	-19.884	+0.056	1904.87	5	3
588	23	Comæ Berenices.....	4.8	12 29 52	+23 10 48.54	-19.877	+0.065	1905.08	7	.
589	24	Comæ Berenices.....	5.2	12 30 7	+18 55 39.17	-19.874	+0.066	1905.89	4	.
590	f	Virginis.....	5.9	12 31 38	-5 16 51.24	-19.856	+0.070	1904.36	8	.
591	9	Canum Venaticorum.....	6.3	12 33 58	+41 25 29.30	-19.827	+0.071	1905.39	4	.
592	2	Virginis.....	4.8	12 34 5	-7 26 42.59	-19.826	+0.075	1904.62	8	.
593	γ	Virginis* (mean).....	2.9	12 36 36	-0 54 3.58	-19.792	+0.078	1906.18	4	.
594	ρ	Virginis.....	5.0	12 36 49	+10 47 11.90	-19.789	+0.079	1904.62	8	.
595	76	Ursæ Majoris.....	5.9	12 37 12	+63 15 43.24	-19.783	+0.070	1906.19	5	.
596	330 G.	Hydræ.....	5.7	12 38 41	-27 46 30.66	-19.762	+0.086	1904.87	6	.
597		Groombridge 1922.....	5.5	12 40 26	+45 59 13.77	-19.736	+0.081	1904.72	6	.
598	d ²	Virginis.....	5.2	12 40 34	+8 13 12.63	-19.734	+0.086	1905.37	9	.
599	35	Virginis.....	6.7	12 42 46	+4 7 7.56	-19.699	+0.091	1904.50	7	.
600	p	Centauri.....	5.0	12 45 16	-33 27 14.32	-19.657	+0.101	1904.52	7	.
601	31	Comæ Berenices.....	5.1	12 46 50	+28 5 5.04	-19.630	+0.095	1905.78	5	.
602	32 ² H.	Camelopardalis.....	5.3	12 48 23	+83 57 22.94	-19.602	+0.020	1904.67	5	2
603	φ	Virginis.....	4.9	12 49 9	-8 59 44.84	-19.588	+0.105	1904.61	9	.
604	ε	Ursæ Majoris.....	1.7	12 49 38	+56 30 9.06	-19.579	+0.092	1905.91	4	.
605	δ	Virginis.....	3.7	12 50 34	+3 56 26.54	-19.561	+0.104	1905.88	4	.
606	12	Canum Venaticorum.....	5.4	12 51 21	+38 51 30.91	-19.546	+0.090	1901.94	9	.
607	8	Draconis.....	5.3	12 51 30	+65 58 51.72	-19.543	+0.086	1905.03	2	2
608	ε	Virginis.....	3.0	12 57 12	+11 29 48.55	-19.426	+0.115	1903.80	8	.
609	48	Virginis.....	6.5	12 58 45	-3 7 31.12	-19.392	+0.122	1904.82	11	.
610	14	Canum Venaticorum.....	5.1	13 1 4	+36 20 2.24	-19.339	+0.116	1904.19	5	.
611		Groombridge 2006.....	7.6	13 4 30	+88 11 12.10	-19.258	-0.343	1905.25	8	2
612	θ	Virginis.....	4.4	13 4 46	-5 0 18.24	-19.252	+0.134	1904.61	5	.
613	17	Canum Venaticorum.....	6.0	13 5 28	+39 1 49.17	-19.235	+0.121	1905.42	4	.
614	43	Comæ Berenices.....	4.3	13 7 12	+28 23 10.14	-19.191	+0.124	1904.59	5	.
615	19	Canum Venaticorum.....	5.7	13 11 2	+41 22 59.76	-19.092	+0.128	1905.70	6	.
616	r	Centauri.....	5.4	13 11 20	-30 58 37.12	-19.084	+0.156	1904.53	7	.
617	σ	Virginis.....	5.0	13 12 33	+5 59 48.87	-19.051	+0.145	1905.27	9	.
618	20	Canum Venaticorum.....	4.7	13 13 4	+41 5 56.56	-19.037	+0.131	1906.38	4	.
619	61	Virginis.....	4.8	13 13 10	-17 45 22.65	-19.034	+0.148	1904.60	6	.
620	γ	Hydræ.....	3.3	13 13 29	-22 38 38.24	-19.025	+0.158	1906.22	5	.
621	23	Canum Venaticorum.....	5.7	13 15 50	+40 40 31.65	-18.959	+0.135	1905.81	5	.
622	l	Ursæ Minoris.....	7.4	13 18 39	+85 16 38.33	-18.878	-0.119	1904.47	4	2
623	ζ ¹	Ursæ Majoris.....	2.4	13 19 54	+55 26 59.76	-18.841	+0.130	1905.87	4	.
624	α	Virginis.....	1.2	13 19 55	-10 38 22.11	-18.840	+0.165	1903.64	5	.
625	i	Virginis.....	5.6	13 21 26	-12 11 13.68	-18.795	+0.168	1904.51	7	.
626	70	Virginis.....	5.2	13 23 32	+14 18 43.58	-18.730	+0.160	1904.53	7	.
627	9 B.	Ursæ Minoris.....	6.1	13 23 35	+72 54 38.65	-18.728	+0.087	1904.43	3	2
628	69 H.	Ursæ Majoris.....	5.4	13 24 47	+60 27 43.88	-18.691	+0.124	1904.84	5	.
629	73	Virginis.....	5.9	13 26 39	-18 12 47.37	-18.631	+0.181	1905.44	4	.
630	350 G.	Hydræ.....	5.7	13 27 2	-28 10 39.10	-18.619	+0.187	1905.41	5	.

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031	7	Virginis.....	3.4	13 29 36	- 0 5 4.63	-18.534	+0.176	1904.27	6
032	81	Ursæ Majoris.....	5.5	13 30 17	+55 51 30.01	-18.512	+0.137	1905.41	7
033	17 H.	Canum Venaticorum.....	5.0	13 30 20	+37 41 40.64	-18.510	+0.159	1906.20	5
034	25	Canum Venaticorum.....	4.9	13 33 1	+36 48 12.92	-18.418	+0.161	1905.38	4
035	13 B.	Ursæ Minoris.....	5.7	13 34 47	+71 45 3.59	-18.357	+0.091	1904.61	9 2
636	m	Virginis.....	5.2	13 36 22	- 8 11 53.62	-18.301	+0.194	1905.22	5
037	83	Virginis.....	5.7	13 39 6	-15 40 33.46	-18.202	+0.205	1904.59	10
638	i	Centauri.....	4.4	13 40 0	-32 32 17.02	-18.168	+0.215	1905.62	9
039	τ	Boötis.....	4.5	13 42 31	+17 57 18.66	-18.075	+0.185	1902.87	7
640	η	Ursæ Majoris.....	1.9	13 43 36	+49 48 44.71	-18.033	+0.158	1903.08	10
641	89	Virginis.....	5.1	13 44 26	-17 38 9.78	-18.001	+0.216	1904.80	5
642	h	Centauri.....	4.8	13 47 27	-31 26 1.25	-17.884	+0.234	1905.16	7
643	7	Boötis.....	5.7	13 48 26	+18 25 32.12	-17.844	+0.198	1904.11	6
644	i	Draconis.....	4.8	13 48 31	+65 13 1.86	-17.842	+0.124	1904.16	7 4
645	η	Boötis.....	2.8	13 49 55	+18 53 54.70	-17.785	+0.200	1903.07	8
646	92	Virginis.....	5.9	13 51 22	+ 1 32 22.34	-17.726	+0.215	1904.63	8
647	47	Hydræ.....	5.2	13 52 54	-24 29 2.43	-17.663	+0.238	1905.08	7
648	48	Hydræ.....	5.8	13 54 24	-24 31 19.93	-17.601	+0.240	1904.42	4
649	τ	Virginis.....	4.3	13 56 33	+ 2 1 42.36	-17.510	+0.224	1905.09	6
650	11	Boötis.....	6.1	13 56 38	+27 52 10.39	-17.506	+0.200	1904.57	7
651	π	Hydræ.....	3.5	14 0 41	-26 12 2.16	-17.331	+0.257	1905.76	7
652	94	Virginis.....	6.6	14 1 0	- 8 24 51.56	-17.317	+0.240	1904.38	10
653	α	Draconis.....	3.6	14 1 41	+64 51 13.57	-17.287	+0.127	1902.09	10 2
654	9 H.	Boötis.....	4.4	14 3 56	+44 19 47.89	-17.187	+0.187	1904.76	9
655	d	Boötis.....	4.8	14 5 50	+25 33 54.36	-17.100	+0.216	1904.65	5
656	κ	Virginis.....	4.3	14 7 34	- 9 48 29.44	-17.021	+0.253	1904.21	5
657	4	Ursæ Minoris.....	5.0	14 9 14	+78 1 3.14	-16.943	-0.017	1903.78	9 2
658	z	Virginis.....	4.2	14 10 46	- 5 31 26.15	-16.871	+0.255	1904.81	5
659	α	Boötis.....	0.2	14 11 6	+19 42 6.70	-16.855	+0.217	1902.13	11
660	λ	Boötis.....	4.3	14 12 35	+46 32 51.38	-16.785	+0.188	1904.27	5
661	z	Boötis.....	4.8	14 12 38	+51 49 43.14	-16.783	+0.175	1904.89	6
662	λ	Virginis.....	4.6	14 13 42	-12 54 38.46	-16.731	+0.267	1904.65	5
663	2	Libræ.....	6.3	14 18 3	-11 15 26.33	-16.510	+0.273	1904.08	9
664	3 G.	Libræ.....	5.4	14 19 6	-24 21 8.54	-16.466	+0.290	1904.28	8
665		Groombridge 2109.....	6.3	14 21 24	+38 50 41.02	-16.351	+0.214	1898.76	3
666	θ	Boötis.....	4.1	14 21 48	+52 18 44.96	-16.331	+0.178	1903.79	6
667	f	Boötis.....	5.4	14 21 48	+19 40 35.22	-16.330	+0.242	1903.81	8
668	52	Hydræ.....	5.0	14 22 19	-29 2 31.39	-16.304	+0.304	1904.48	7
669	φ	Virginis.....	5.0	14 23 3	- 1 46 47.78	-16.267	+0.260	1904.28	5
670	η	Boötis.....	5.6	14 25 9	+50 17 32.38	-16.159	+0.184	1904.53	8
671	204 B.	Boötis.....	6.4	14 25 40	+42 14 48.43	-16.132	+0.212	1905.12	6
672	ρ	Boötis.....	3.8	14 27 31	+30 48 37.53	-16.035	+0.232	1905.72	5
673	5	Ursæ Minoris.....	4.4	14 27 44	+76 8 26.35	-16.024	-0.009	1903.76	5 4
674	γ	Boötis.....	3.0	14 28 3	+38 44 45.27	-16.008	+0.218	1905.06	5
675	56 B.	Draconis.....	6.2	14 29 0	+60 39 58.35	-15.958	+0.150	1904.43	6
676	σ	Boötis.....	4.5	14 30 20	+30 10 46.65	-15.887	+0.241	1904.57	7
677	6 B.	Libræ.....	6.2	14 31 41	-11 52 47.48	-15.815	+0.287	1905.09	9
678	33	Boötis.....	5.4	14 35 7	+44 50 9.94	-15.628	+0.210	1903.57	0
679	π	Boötis.....	4.9	14 36 2	+16 50 40.10	-15.578	+0.266	1903.59	7
680	ε	Boötis.....	4.4	14 36 22	+14 9 26.33	-15.559	+0.270	1903.35	7
681	ε ¹	Centauri.....	4.1	14 37 32	-34 44 35.86	-15.494	+0.344	1905.25	7
682	μ	Virginis.....	4.0	14 37 47	- 5 13 26.09	-15.480	+0.300	1905.27	5
683	34	Boötis.....	4.9	14 39 2	+26 57 10.32	-15.411	+0.253	1904.43	8
684		Piazz 166.....	6.4	14 40 30	-20 45 6.78	-15.328	+0.325	1904.61	7
685	ε	Boötis.....	2.7	14 40 37	+27 29 45.49	-15.322	+0.252	1902.75	8
686	109	Virginis.....	3.8	14 41 12	+ 2 18 51.21	-15.290	+0.292	1904.29	6
687	μ	Libræ.....	5.4	14 43 50	-13 43 56.45	-15.139	+0.320	1904.82	8
688	η	Libræ.....	5.3	14 45 9	-15 34 53.33	-15.063	+0.324	1905.45	4
689	295 B.	Boötis.....	6.0	14 45 11	+38 13 23.71	-15.061	+0.231	1905.47	6
690	α	Libræ.....	2.9	14 45 21	-15 37 34.65	-15.052	+0.324	1905.66	6
691	ε	Boötis.....	4.8	14 46 47	+19 30 57.56	-14.969	+0.276	1904.51	8
692	61 B.	Draconis.....	5.7	14 48 54	+59 42 1.27	-14.845	+0.154	1904.00	6
693	ε ¹	Libræ.....	5.8	14 48 57	-11 29 25.26	-14.842	+0.324	1904.42	7
694	381 G.	Centauri.....	5.3	14 49 36	-33 26 58.77	-14.803	+0.307	1904.87	7
695	β	Ursæ Minoris.....	2.2	14 51 0	+74 33 51.61	-14.721	-0.016	1904.52	6 4

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666	ξ^2 Libræ	5.6	<i>h m s</i> 14 51 20	<i>° ' "</i> -11 0 21.74	" -14.701	" +0.328	1905.22	8	.
697	321 B. Boötis	5.8	14 51 30	+14 51 1.11	-14.691	+0.287	1906.27	5	.
698	43 B. Libræ	5.8	14 51 37	-20 58 0.59	-14.684	+0.361	1905.08	5	.
699	Piazz 235	5.7	14 53 4	+50 2 15.92	-14.598	+0.206	1898.76	3	.
700	δ Libræ	4.8	14 55 38	-8 7 20.05	-14.443	+0.329	1903.91	8	.
701	2 H. Ursæ Minoris	4.9	14 56 0	+66 19 50.53	-14.421	+0.100	1903.98	4	2
702	β Boötis	3.6	14 58 11	+40 47 5.25	-14.287	+0.237	1903.10	5	.
703	γ Scorpii	3.4	14 58 13	-24 53 19.88	-14.285	+0.364	1905.29	6	.
704	ϕ Boötis	4.7	15 0 10	+27 20 14.85	-14.165	+0.270	1905.97	4	.
705	ψ Boötis (<i>north fol.</i>)	5.3	15 0 30	+48 2 37.18	-14.144	+0.207	1904.70	10	.
706	ϵ Boötis	5.0	15 2 55	+25 15 30.12	-13.994	+0.283	1903.89	11	.
707	ϵ Libræ	4.7	15 6 31	-19 24 48.15	-13.766	+0.367	1905.15	6	.
708	1 Lupi	5.0	15 8 30	-31 8 44.71	-13.640	+0.397	1904.97	12	.
709	57 B. Ursæ Minoris	7.1	15 9 21	+87 37 3.67	-13.586	-2.198	1903.26	7	2
710	3 Serpentis	5.4	15 10 13	+5 18 37.87	-13.529	+0.326	1903.76	7	.
711	δ Boötis	3.5	15 11 28	+33 41 15.47	-13.448	+0.268	1904.31	5	.
712	β Libræ	2.7	15 11 37	-9 0 49.66	-13.438	+0.354	1905.04	5	.
713	1 H. Ursæ Minoris	5.2	15 13 29	+67 43 33.55	-13.317	+0.083	1903.39	4	2
714	α^2 Libræ	6.8	15 17 27	-14 46 37.19	-13.056	+0.375	1903.97	10	.
715	η Coronæ Borealis	5.6	15 19 4	+30 38 55.34	-12.948	+0.282	1903.79	9	.
716	μ Boötis	4.5	15 20 43	+37 43 39.68	-12.838	+0.258	1903.83	6	.
717	γ^2 Ursæ Minoris	3.1	15 20 53	+72 11 23.60	-12.826	-0.009	1905.62	4	4
718	τ^1 Serpentis	5.5	15 21 9	+15 46 46.58	-12.808	+0.317	1905.48	4	.
719	32 Libræ	5.9	15 22 37	-16 22 3.99	-12.710	+0.386	1904.42	10	.
720	ϵ Draconis	3.5	15 22 42	+59 18 58.13	-12.704	+0.156	1906.47	4	.
721	β Coronæ Borealis	3.7	15 23 42	+29 27 1.78	-12.636	+0.284	1906.48	4	.
722	ν^1 Boötis	5.2	15 27 20	+41 10 26.02	-12.388	+0.252	1904.01	6	.
723	ν^2 Boötis	5.0	15 28 12	+41 14 18.68	-12.328	+0.252	1904.75	6	.
724	θ Coronæ Borealis	4.2	15 28 54	+31 41 47.06	-12.280	+0.284	1904.68	5	.
725	γ Libræ	4.0	15 29 56	-14 27 21.46	-12.208	+0.393	1904.63	7	.
726	α Coronæ Borealis	2.3	15 30 27	+27 3 4.47	-12.172	+0.300	1902.20	9	.
727	3 H. Scorpii	3.8	15 30 57	-27 48 14.02	-12.138	+0.427	1904.72	7	.
728	B. D. +43° 2510	6.8	15 31 44	+43 29 55.19	-12.083	+0.245	1904.44	6	.
729	ϕ Boötis	5.4	15 34 14	+40 40 44.49	-11.908	+0.259	1905.70	5	.
730	θ Ursæ Minoris	5.3	15 34 23	+77 40 57.20	-11.898	-0.216	1904.27	9	4
731	ζ Coronæ Borealis	5.1	15 35 37	+36 57 37.01	-11.811	+0.271	1904.69	5	.
732	κ Libræ	5.0	15 36 11	-19 21 16.99	-11.770	+0.412	1905.10	7	.
733	ϵ Serpentis	4.5	15 37 6	+19 59 32.41	-11.706	+0.321	1904.08	7	.
734	γ Coronæ Borealis	3.9	15 38 33	+26 36 45.37	-11.602	+0.304	1905.13	6	.
735	α Serpentis	2.8	15 39 21	+6 44 25.01	-11.546	+0.358	1902.40	8	.
736	β Serpentis	3.7	15 41 34	+15 44 4.86	-11.385	+0.338	1903.51	9	.
737	κ Serpentis	4.3	15 44 14	+18 27 0.71	-11.193	+0.331	1905.45	3	.
738	μ Serpentis	3.6	15 44 24	-3 7 27.49	-11.181	+0.382	1903.78	7	.
739	χ Lupi	4.1	15 44 36	-33 19 21.68	-11.166	+0.465	1904.47	8	.
740	12 H. Draconis	5.1	15 45 8	+62 54 30.42	-11.127	+0.115	1904.29	5	.
741	ϵ Serpentis	3.8	15 45 50	+4 46 43.32	-11.077	+0.369	1905.33	6	.
742	λ Libræ	5.1	15 47 32	-19 52 4.72	-10.953	+0.429	1905.07	6	.
743	ζ Ursæ Minoris	4.3	15 47 37	+78 6 8.34	-10.946	-0.267	1904.78	5	4
744	χ Herculis	4.6	15 49 13	+42 43 55.39	-10.829	+0.264	1905.07	5	.
745	ρ Scorpii	4.0	15 50 43	-28 55 18.86	-10.719	+0.460	1904.06	10	.
746	γ Serpentis	3.9	15 51 50	+15 59 10.88	-10.636	+0.349	1904.70	5	.
747	π Scorpii	3.0	15 52 48	-25 49 34.28	-10.564	+0.453	1904.48	9	.
748	ϵ Coronæ Borealis	4.2	15 53 27	+27 10 2.69	-10.516	+0.312	1902.29	8	.
749	δ Scorpii	2.5	15 54 25	-22 20 13.13	-10.443	+0.445	1905.76	4	.
750	49 Libræ	5.5	15 54 43	-16 14 21.13	-10.421	+0.418	1904.45	9	.
751	66 H ¹ . Draconis	5.0	15 55 25	+55 1 56.28	-10.369	+0.179	1904.31	5	.
752	τ Herculis	5.3	15 56 45	+18 5 41.43	-10.269	+0.341	1903.57	9	.
753	β^1 Scorpii	2.9	15 59 37	-19 31 53.92	-10.052	+0.443	1904.85	5	.
754	θ Draconis	4.1	16 0 1	+58 49 58.05	-10.022	+0.141	1906.47	4	.
755	ω^2 Scorpii	4.6	16 1 32	-20 35 54.77	-9.907	+0.450	1904.66	10	.
756	κ Herculis	5.3	16 3 34	+17 18 48.01	-9.752	+0.348	1904.73	8	.
757	τ Coronæ Borealis	4.9	16 5 19	+36 44 43.38	-9.618	+0.284	1905.48	4	.
758	ϕ Herculis	4.3	16 5 37	+45 11 49.04	-9.595	+0.246	1904.50	5	.
759	87 B. Draconis	5.4	16 6 3	+68 4 25.12	-9.562	+0.022	1905.17	5	4
760	ϵ^1 Scorpii	4.7	16 6 9	-27 40 0.85	-9.555	+0.476	1904.57	9	.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
761	ν Scorpii	4.3	16 0 11	-19 12 2.67	-9.552	+0.450	1904.62	6	.
762	δ Ophiuchi	3.0	16 9 6	-3 26 12.93	-9.326	+0.409	1902.86	7	.
763	σ^2 Coronæ Borealis	5.8	16 10 56	+34 6 42.52	-9.184	+0.292	1905.73	4	.
764	ε Ophiuchi	3.3	16 13 2	-4 26 55.26	-9.021	+0.417	1905.94	4	.
765	19 Ursæ Minoris	5.5	16 13 40	+76 7 45.92	-8.970	-0.226	1904.19	9	4
766	σ Scorpii	3.1	16 15 7	-25 21 10.07	-8.858	+0.480	1904.26	10	.
767	τ Herculis	3.9	16 16 44	+46 33 5.12	-8.730	+0.240	1905.49	4	.
768	σ Serpentis	4.8	16 17 0	+1 15 50.33	-8.709	+0.400	1904.26	10	.
769	γ Herculis	3.8	16 17 31	+19 23 10.40	-8.669	+0.351	1905.30	5	.
770	ξ Coronæ Borealis	4.7	16 18 12	+31 7 27.25	-8.614	+0.311	1905.96	4	.
771	23 Herculis	6.2	16 19 6	+32 33 57.79	-8.543	+0.307	1905.11	5	.
772	ρ Ophiuchi * (mean)	4.8	16 19 35	-23 12 59.27	-8.525	+0.478	1905.95	4	.
773	α Ophiuchi (south star)	5.2	16 19 35	-23 13 1.08	-8.505	+0.478	1903.66	7	.
774	η Ursæ Minoris	5.0	16 20 25	+75 59 9.83	-8.439	-0.238	1903.40	7	4
775	ω Herculis	4.5	16 20 48	+14 15 47.17	-8.469	+0.368	1905.55	4	.
776	98 B. Draconis	5.7	16 22 14	+55 25 56.65	-8.295	+0.178	1906.42	4	.
777	η Draconis	2.9	16 22 38	+61 44 25.64	-8.263	+0.110	1903.57	6	.
778	α Scorpii	1.2	16 23 16	-26 12 35.82	-8.212	+0.492	1904.63	3	.
779	N Scorpii	4.3	16 24 51	+34 29 11.95	-8.086	+0.525	1904.85	9	.
780	g Herculis	5.0	16 25 21	+42 6 5.78	-8.045	+0.266	1905.31	4	.
781	λ Ophiuchi	3.8	16 25 52	+2 12 9.46	-8.004	+0.407	1904.81	7	.
782	β Herculis	2.8	16 25 55	+21 42 26.31	-8.000	+0.347	1905.98	4	.
783	34 Herculis	6.2	16 27 21	+49 10 42.45	-7.885	+0.223	1904.78	6	.
784	A Draconis	5.0	16 28 11	+68 59 4.68	-7.819	-0.016	1904.66	7	4
785	τ Scorpii	2.9	16 29 39	-28 0 30.42	-7.699	+0.505	1905.12	6	.
786	σ Herculis	4.2	16 30 53	+42 38 36.17	-7.600	+0.264	1905.31	5	.
787	ζ Ophiuchi	2.7	16 31 39	-10 21 51.33	-7.538	+0.449	1906.04	4	.
788	70 B. Ursæ Minoris	6.4	16 34 56	+77 38 46.14	-7.271	-0.361	1904.66	5	5
789	24 Scorpii	5.0	16 35 47	-17 32 54.70	-7.201	+0.474	1904.35	5	.
790	42 Herculis	5.1	16 36 2	+49 7 25.67	-7.181	+0.225	1905.19	6	.
791	ζ Herculis	3.0	16 37 31	+31 47 2.33	-7.060	+0.306	1902.86	4	.
792	η Herculis	3.6	16 39 28	+39 6 44.13	-6.900	+0.285	1905.63	3	.
793	114 B. Draconis	4.9	16 43 24	+56 57 38.56	-6.576	+0.160	1904.56	7	.
794	18 Ophiuchi	7.1	16 43 39	-24 27 54.31	-6.555	+0.505	1904.99	6	.
795	ε Scorpii	2.4	16 43 41	-34 6 42.79	-6.553	+0.529	1905.19	5	.
796	20 Ophiuchi	4.7	16 44 18	-10 36 22.44	-6.502	+0.461	1903.83	7	.
797	k Herculis	5.5	16 45 28	+7 25 13.40	-6.405	+0.405	1904.40	7	.
798	49 Herculis	6.4	16 47 32	+15 8 31.02	-6.234	+0.381	1906.18	5	.
799	53 Herculis	5.4	16 49 11	+31 52 0.53	-6.097	+0.317	1906.16	3	.
800	ε Ophiuchi	4.3	16 49 17	+10 19 47.69	-6.089	+0.396	1903.05	4	.
801	24 Ophiuchi	5.6	16 50 46	-22 59 29.64	-5.964	+0.505	1905.16	6	.
802	π Ophiuchi	3.4	16 52 56	+9 31 49.75	-5.783	+0.396	1903.81	6	.
803	117 G. Scorpii	5.1	16 55 25	-31 59 41.98	-5.575	+0.545	1905.40	6	.
804	30 Ophiuchi	5.0	16 55 47	-4 4 22.02	-5.544	+0.445	1905.42	6	.
805	ε Ursæ Minoris	4.4	16 56 12	+82 12 7.92	-5.508	-0.880	1905.02	7	4
806	ε Herculis	3.9	16 56 28	+31 4 25.17	-5.487	+0.324	1903.22	3	.
807	d Herculis	5.3	16 57 55	+33 42 46.00	-5.365	+0.313	1904.18	5	.
808	60 Herculis	4.9	17 0 44	+12 52 40.78	-5.126	+0.395	1904.25	8	.
809	98 H ¹ . Herculis	6.3	17 4 31	+40 38 47.95	-4.806	+0.279	1906.41	4	.
810	η Ophiuchi	2.6	17 4 39	-15 36 3.74	-4.795	+0.489	1903.91	3	.
811	ζ Draconis	3.2	17 8 30	+65 50 16.08	-4.467	+0.025	1904.48	4	4
812	A Ophiuchi (south star)	5.3	17 9 12	-26 27 25.35	-4.408	+0.521	1903.36	1	.
813	A Ophiuchi * (mean)	4.6	17 9 12	-26 27 25.64	-4.408	+0.521	1905.53	4	.
814	α Herculis (brighter)	3.5	17 10 5	+14 30 15.21	-4.331	+0.391	1904.12	6	.
815	139 G. Scorpii	5.6	17 10 33	-32 32 58.90	-4.292	+0.556	1904.81	4	.
816	δ Herculis	3.2	17 10 55	+24 57 24.63	-4.260	+0.352	1903.09	4	.
817	π Herculis	3.4	17 11 34	+36 55 17.70	-4.205	+0.299	1906.17	3	.
818	u Herculis	4 6-5.4	17 13 38	+33 12 27.31	-4.028	+0.318	1905.81	5	.
819	e Herculis	4.8	17 14 13	+37 23 46.17	-3.978	+0.297	1906.09	4	.
820	ξ Ophiuchi	4.5	17 15 1	-21 0 21.21	-3.910	+0.518	1904.33	4	.
821	θ Ophiuchi	3.4	17 15 52	-24 53 58.93	-3.836	+0.528	1904.99	5	.
822	w Herculis	5.4	17 16 55	+32 35 40.57	-3.746	+0.324	1905.19	2	.
823	ρ Herculis (fainter)	4.5	17 20 14	+37 14 15.92	-3.461	+0.298	1905.65	4	.
824	b Ophiuchi	4.3	17 20 16	-24 5 0 50	-3.459	+0.527	1905.55	4	.
825	d Ophiuchi	4.4	17 20 58	-29 46 35.42	-3.398	+0.551	1904.94	6	.

772. Double, 5^m.2-5^m.9, 3^s.5, 350°.814. Double, 5^m.3-5^m.3, 4^s, 190°, slow binary.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
			<i>h m s</i>	<i>° ' "</i>	<i>"</i>	<i>"</i>			
826	σ Ophiuchi	4.4	17 21 33	+ 4 13 37.51	-3.347	+0.429	1904.50	8	..
827	x Hercules	5.8	17 24 5	+48 20 37.68	-3.128	+0.230	1906.08	4	..
828	51 Ophiuchi	4.9	17 25 19	-23 53 6.93	-3.022	+0.528	1906.08	4	..
829	λ Hercules	4.5	17 26 42	+26 11 9.15	-2.993	+0.351	1904.66	2	..
830	β Draconis	3.0	17 28 10	+52 22 31.30	-2.775	+0.196	1903.07	3	..
831	ν^1 Draconis	5.0	17 30 12	+55 15 9.24	-2.599	+0.174	1905.49	4	..
832	α Ophiuchi	2.1	17 30 18	+12 37 58.18	-2.591	+0.405	1900.44	7	..
833	ν^2 Draconis	5.0	17 30 18	+55 14 27.85	-2.591	+0.174	1905.58	4	..
834	ξ Serpentis	3.6	17 31 52	-15 20 8.36	-2.455	+0.497	1905.50	4	..
835	f Draconis	5.2	17 32 22	+68 11 56.01	-2.412	-0.036	1905.59	6	4
836	o Serpentis	4.4	17 35 48	-12 49 18.80	-2.113	+0.489	1904.81	5	..
837	ϵ Hercules	3.8	17 36 39	+46 3 34.04	-2.040	+0.246	1905.45	2	..
838	ω Draconis	4.9	17 37 32	+68 48 17.28	-1.962	-0.050	1900.25	4	5
839	324 B. Hercules	6.7	17 37 36	+43 31 11.05	-1.956	+0.264	1900.42	4	..
840	β Ophiuchi	2.9	17 38 32	+ 4 36 33.40	-1.875	+0.430	1906.09	4	..
841	X Sagittarii	4.4-5.0	17 41 16	-27 47 33.66	-1.637	+0.549	1904.96	6	..
842	μ Hercules	3.5	17 42 33	+27 46 40.79	-1.525	+0.338	1905.42	4	..
843	γ Ophiuchi	3.7	17 42 53	+ 2 44 40.83	-1.496	+0.438	1905.64	4	..
844	ψ^1 Draconis	4.9	17 43 43	+72 11 51.10	-1.423	-0.156	1905.69	4	3
845	87 Hercules	5.3	17 44 46	+25 39 21.26	-1.332	+0.354	1905.19	5	..
846	z Hercules	6.4	17 47 26	+48 25 15.79	-1.098	+0.229	1904.10	4	..
847	168 H ¹ . Hercules	6.1	17 48 49	+40 0 14.11	-0.977	+0.284	1905.85	5	..
848	9 G. Sagittarii	6.4	17 50 2	-18 47 4.90	-0.871	+0.514	1906.08	4	..
849	89 Hercules	5.5	17 51 23	+26 3 56.61	-0.753	+0.353	1904.32	3	..
850	ξ Draconis	3.9	17 51 48	+56 53 17.42	-0.717	+0.153	1905.68	4	..
851	θ Hercules	4.0	17 52 49	+37 15 48.97	-0.628	+0.300	1905.66	4	..
852	ν Ophiuchi	3.5	17 53 31	- 9 45 41.70	-0.567	+0.481	1906.00	4	..
853	ξ Hercules	3.8	17 53 53	+29 15 30.54	-0.535	+0.341	1906.12	4	..
854	35 Draconis	5.0	17 53 56	+76 58 35.53	-0.531	-0.390	1905.47	4	5
855	γ Draconis	2.4	17 54 17	+51 30 1.50	-0.500	+0.203	1905.25	2	..
856	67 Ophiuchi	3.9	17 55 38	+ 2 56 10.80	-0.382	+0.438	1906.01	4	..
857	τ Ophiuchi *(mean)	4.9	17 57 38	- 8 10 48.43	-0.206	+0.477	1904.96	6	..
858	γ Sagittarii	3.1	17 59 23	-30 25 31.46	-0.054	+0.501	1905.66	4	..
859	70 Ophiuchi *(mean)	4.1	18 0 24	+ 2 31 17.89	+0.035	+0.444	1904.12	4	..
860	72 Ophiuchi	3.7	18 2 37	+ 9 32 59.03	+0.228	+0.414	1905.68	4	..
861	o Hercules	3.8	18 3 38	+28 44 55.42	+0.318	+0.341	1904.70	2	..
862	102 Hercules	4.3	18 4 29	+20 47 55.43	+0.392	+0.374	1905.23	5	..
863	δ Ursæ Minoris	4.4	18 4 33	+86 36 48.05	+0.308	-2.837	1903.80	24	38
864	40 Draconis	6.2	18 7 32	+79 59 17.75	+0.658	-0.649	1906.24	2	4
865	μ Sagittarii	4.0	18 7 47	-21 5 5.94	+0.681	+0.522	1905.61	4	..
866	24 Ursæ Minoris	5.9	18 7 48	+86 59 38.32	+0.682	-3.238	1905.50	5	3
867	5 B. Lyrae	5.4	18 12 32	+42 7 30.53	+1.096	+0.271	1905.66	4	..
868	36 Draconis	5.0	18 13 19	+64 21 47.86	+1.165	+0.058	1905.62	4	..
869	δ Sagittarii	2.8	18 14 36	-29 52 14.26	+1.276	+0.559	1904.82	7	..
870	η Serpentis	3.4	18 16 8	- 2 55 32.33	+1.410	+0.445	1904.73	2	..
871	ϵ Sagittarii	2.0	18 17 32	-34 25 54.23	+1.532	+0.578	1905.69	4	..
872	446 B. Hercules	5.7	18 17 58	+23 14 3.72	+1.571	+0.362	1904.95	6	..
873	447 B. Hercules	5.5	18 18 24	+17 46 34.38	+1.608	+0.385	1904.98	7	..
874	109 Hercules	3.9	18 19 26	+21 43 25.17	+1.698	+0.373	1905.34	2	..
875	μ Lyrae	5.0	18 20 56	+39 27 9.55	+1.829	+0.286	1905.44	2	..
876	λ Sagittarii	2.9	18 21 48	-25 28 38.09	+1.904	+0.536	1904.64	2	..
877	φ Draconis	4.2	18 22 12	+71 17 4.88	+1.938	-0.125	1905.44	5	6
878	b Draconis*	4.8	18 22 27	+58 44 34.05	+1.961	+0.126	1904.65	2	..
879	χ Draconis	3.7	18 22 52	+72 41 20.58	+1.996	-0.141	1904.21	9	6
880	2 H. Scuti	4.7	18 23 30	-14 37 46.72	+2.052	+0.496	1905.25	7	..
881	c Serpentis	5.4	18 24 29	- 2 2 59.92	+2.137	+0.452	1905.25	5	..
882	3 H. Scuti	4.1	18 29 46	- 5 18 52.37	+2.596	+0.471	1905.61	4	..
883	84 G. Sagittarii	5.8	18 32 26	-23 35 24.64	+2.827	+0.525	1904.95	6	..
884	29 H ¹ . Sagittarii	5.9	18 32 56	-21 8 5.37	+2.871	+0.514	1904.07	5	..
885	α Lyrae	0.1	18 33 33	+38 41 27.02	+2.924	+0.294	1904.72	2	..

857. Double, $5^m.3-6^m.0$, $2''$, binary.859. Double, $4^m.3-6^m.0$, $2''$, binary.878. Double, $5^m.1-8^m.0$, $3''.6$, 0° ; assumed that brighter star was observed, see p. IX.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
886	156 H ¹ . Draconis.....	5.8	<i>h m s</i> 18 34 35	<i>° ' "</i> +77 28 9.20	<i>"</i> +3.014	<i>"</i> -0.415	1904.30	5	3
887	153 H ¹ . Draconis.....	6.0	18 35 54	+05 23 57.10	+3.128	+0.026	1905.92	5	
888	4 H. Scuti.....	4.7	18 30 48	-9 8 53.85	+3.205	+0.472	1904.18	4	
880	φ Sagittarii.....	3.3	18 30 25	-27 5 35.44	+3.430	+0.538	1904.21	4	
890	ε ¹ Lyrae (south star).....	5.1	18 41 2	+39 33 55.90	+3.569	+0.283	1904.60	1	
891	ε ¹ Lyrae * (mean).....	4.7	18 41 2	+39 33 56.48	+3.569	+0.283	1906.00	3	
892	ε ² Lyrae * (mean).....	4.5	18 41 4	+39 30 28.75	+3.573	+0.283	1904.62	2	
893	110 Herculis.....	4.3	18 41 21	+20 27 0.10	+3.598	+0.368	1905.72	4	
894	6 H. Scuti.....	4.5	18 41 52	-4 51 17.25	+3.642	+0.455	1905.02	6	
895	111 Herculis.....	4.4	18 42 36	+18 4 12.91	+3.705	+0.378	1904.38	3	
896	204 B. Draconis.....	5.8	18 44 20	+52 52 40.75	+3.867	+0.191	1904.95	6	
897	30 Sagittarii.....	6.2	18 44 50	-22 16 35.56	+3.896	+0.513	1904.81	7	
898	β Lyrae.....	3.4-4.1	18 40 23	+33 14 47.02	+4.030	+0.315	1904.54	5	
899	σ Sagittarii.....	2.1	18 40 4	-26 25 15.15	+4.259	+0.528	1904.30	2	
900	50 Draconis.....	5.4	18 49 36	+75 18 58.67	+4.305	-0.274	1904.51	4	4
901	o Draconis.....	4.8	18 40 44	+59 15 57.35	+4.316	+0.126	1905.65	4	
902	θ Serpentis.....	4.5	18 51 15	+4 4 24.16	+4.446	+0.422	1905.63	4	
903	ξ Sagittarii.....	3.6	18 51 46	-21 14 16.74	+4.489	+0.507	1904.02	6	
904	R Lyrae.....	4.3	18 52 18	+43 48 51.54	+4.534	+0.258	1904.70	2	
905	ε Aquilæ.....	4.2	18 55 5	+14 55 55.97	+4.772	+0.383	1905.64	4	
906	γ Lyrae.....	3.3	18 55 12	+32 33 8.23	+4.782	+0.315	1905.72	4	
907	υ Draconis.....	4.0	18 55 37	+71 9 49.22	+4.818	-0.102	1905.42	7	5
908	ζ Sagittarii.....	2.7	18 56 15	-30 1 23.74	+4.871	+0.538	1903.96	7	
909	τ Sagittarii.....	3.4	19 0 42	-27 49 0.50	+5.247	+0.524	1904.50	9	
910	ζ Aquilæ.....	3.0	19 0 49	+13 42 52.46	+5.257	+0.385	1904.72	2	
911	λ Aquilæ.....	3.6	19 0 57	-5 1 57.81	+5.268	+0.445	1904.80	2	
912	17 Lyrae.....	5.0	19 3 39	+32 20 37.69	+5.496	+0.317	1905.65	4	
913	ι Lyrae.....	5.1	19 3 44	+35 56 36.00	+5.503	+0.298	1905.65	4	
914	π Sagittarii.....	3.0	19 3 49	-21 10 58.30	+5.510	+0.498	1904.50	2	
915	19 Lyrae.....	5.8	19 7 56	+31 6 59.28	+5.855	+0.318	1902.98	3	
916	21 Aquilæ.....	5.1	19 8 40	+2 7 25.75	+5.917	+0.419	1904.65	8	
917	55 Draconis.....	6.2	19 9 23	+65 48 40.80	+5.977	+0.030	1904.21	5	2
918	ψ Sagittarii.....	4.9	19 9 25	-25 25 44.05	+5.979	+0.510	1904.11	5	
919	22 Aquilæ.....	5.4	19 11 34	+4 39 30.06	+6.159	+0.410	1904.70	8	
920	d Sagittarii.....	5.0	19 11 47	-19 7 51.65	+6.177	+0.484	1905.70	4	
921	δ Draconis.....	3.2	19 12 32	+67 29 8.53	+6.239	+0.003	1904.54	4	4
922	θ Lyrae.....	4.5	19 12 54	+37 57 20.66	+6.269	+0.285	1905.75	4	
923	ω Aquilæ.....	5.1	19 13 7	+11 24 53.99	+6.288	+0.387	1904.60	2	
924	κ Cygni.....	4.0	19 14 48	+53 11 2.78	+6.427	+0.190	1904.76	2	
925	159 B. Lyrae.....	6.7	19 15 38	+40 10 33.30	+6.496	+0.274	1905.70	4	
926	τ Draconis.....	4.6	19 17 20	+73 10 12.26	+6.649	-0.162	1904.53	4	4
927	b Aquilæ.....	5.2	19 20 12	+11 43 51.82	+6.873	+0.306	1904.67	8	
928	η Aquilæ.....	3.4	19 20 27	+2 54 55.95	+6.894	+0.414	1904.72	2	
929	186 G. Sagittarii.....	5.7	19 20 37	-29 56 27.29	+6.908	+0.517	1905.01	6	
930	21 B. Vulpeculæ.....	6.2	19 21 17	+24 43 52.18	+6.962	+0.334	1905.29	5	
931	5 Vulpeculæ.....	5.6	19 21 51	+19 53 56.33	+7.009	+0.354	1904.08	5	
932	λ Ursæ Minoris.....	6.6	19 22 30	+88 50 16.06	+7.060	-0.267	1903.74	5	7
933	4 Cygni.....	5.2	19 22 33	+36 7 1.40	+7.066	+0.291	1902.80	3	
934	6 Vulpeculæ.....	4.6	19 24 33	+24 27 44.27	+7.228	+0.335	1904.83	7	
935	e Aquilæ.....	5.2	19 25 26	-2 59 50.37	+7.301	+0.423	1903.69	8	
936	β Cygni.....	3.2	19 26 41	+27 44 58.24	+7.403	+0.324	1899.87	10	
937	γ Cygni.....	3.9	19 27 11	+51 30 59.76	+7.444	+0.202	1904.36	5	
938	225 B. Draconis.....	6.0	19 27 45	+79 24 8.83	+7.400	-0.481	1904.01	9	7
939	B. D. -83° 55'	6.3	19 27 57	+83 16 6.36	+7.506	-1.007	1902.78	3	2
940	8 Cygni.....	4.8	19 28 3	+34 14 24.57	+7.514	+0.298	1903.14	7	
941	μ Aquilæ.....	4.6	19 29 12	+7 9 58.70	+7.607	+0.394	1902.99	3	
942	h Sagittarii.....	4.7	19 30 37	-25 6 14.61	+7.722	+0.489	1904.78	2	
943	κ Aquilæ.....	5.0	19 31 31	-7 14 59.37	+7.794	+0.431	1902.11	8	
944	e Sagittæ.....	5.7	19 32 46	+16 14 17.19	+7.894	+0.361	1903.69	9	
945	51 B. Cygni.....	6.8	19 33 21	+43 28 55.82	+7.942	+0.252	1903.69	6	
946	θ Cygni.....	4.6	19 33 46	+49 59 22.73	+7.974	+0.212	1902.25	4	
947	σ Aquilæ.....	5.2	19 34 16	+5 10 10.72	+8.014	+0.392	1902.69	6	
948	54 Sagittarii.....	5.4	19 35 0	-16 31 20.63	+8.073	+0.456	1904.09	5	
949	14 Cygni.....	5.4	19 36 11	+42 35 13.31	+8.160	+0.257	1902.15	4	
950	β Sagittæ.....	4.4	19 36 33	+17 14 39.30	+8.198	+0.355	1901.02	5	

891. Double, $\alpha = 6''$, $\beta = 1''$, $\gamma = 19''$.892. Double, $\alpha = 4''$, $\beta = 4''$, $\gamma = 12''$.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
951	e Sagittarii	5.1	19 36 48	-16 21 29.78	+ 8.218	+0.454	1904.75	7	.
952	10 Vulpeculæ	5.4	19 39 33	+25 31 56.59	+ 8.437	+0.326	1904.52	6	.
953	228 G. Sagittarii	5.6	19 39 38	-32 8 59.38	+ 8.444	+0.503	1905.05	6	.
954	f Sagittarii	5.1	19 40 32	-20 0 6.30	+ 8.514	+0.457	1905.30	5	.
955	15 Cygni	5.0	19 40 40	+37 6 45.89	+ 8.525	+0.283	1904.48	5	.
956	r Aquilæ	2.8	19 41 30	+10 22 9.96	+ 8.591	+0.372	1900.33	7	.
957	δ Cygni	3.0	19 41 51	+44 53 11.82	+ 8.619	+0.244	1902.90	7	.
958	δ Sagittæ	3.8	19 42 56	+18 17 15.18	+ 8.704	+0.348	1903.02	7	.
959	ζ Sagittæ	5.0	19 44 32	+18 53 28.25	+ 8.830	+0.345	1903.24	9	.
960	α Aquilæ	0.9	19 45 54	+ 8 36 15.15	+ 8.937	+0.383	1900.33	8	.
961	η Aquilæ	3.7-4.4	19 47 23	+ 0 44 56.04	+ 9.053	+0.394	1904.52	5	.
962	ε Draconis*	4.0	19 48 31	+70 0 48.16	+ 9.141	-0.025	1903.86	14	9
963	β Aquilæ	3.9	19 50 24	+ 6 9 24.26	+ 9.288	+0.377	1901.12	5	.
964	φ Aquilæ	5.3	19 51 30	+11 9 29.02	+ 9.373	+0.362	1903.27	10	.
965	g Sagittarii	5.0	19 52 17	-15 45 24.42	+ 9.433	+0.434	1904.85	7	.
966	ψ Cygni*	4.8	19 53 3	+52 10 24.14	+ 9.492	+0.195	1901.54	5	.
967	r Sagittæ	3.7	19 54 19	+19 13 13.03	+ 9.589	+0.338	1902.48	3	.
968	63 Sagittarii	5.8	19 56 23	-13 54 51.04	+ 9.748	+0.425	1903.24	9	.
969	c Sagittarii	4.6	19 56 31	-27 59 16.36	+ 9.758	+0.467	1904.66	2	.
970	15 Vulpeculæ	4.7	19 56 59	+27 28 37.92	+ 9.794	+0.311	1904.86	8	.
971	269 G. Sagittarii	6.5	19 57 49	-22 52 34.31	+ 9.857	+0.448	1904.16	5	.
972	Groombridge 3402	8.4	19 59 1	+88 49 33.71	+ 9.949	-0.690	1904.36	5	2
973	τ Aquilæ	5.6	19 59 15	+ 6 59 44.42	+ 9.967	+0.367	1902.32	10	.
974	b ² Cygni	4.8	20 5 43	+36 32 42.41	+10.453	+0.272	1903.88	8	.
975	θ Aquilæ	3.4	20 6 9	- 1 7 6.06	+10.485	+0.380	1900.07	9	.
976	20 Vulpeculæ	5.9	20 7 49	+26 10 48.10	+10.610	+0.306	1903.68	8	.
977	66 Aquilæ	5.6	20 8 4	- 1 18 33.35	+10.628	+0.379	1903.34	6	.
978	ρ Aquilæ	5.0	20 9 39	+14 53 33.62	+10.745	+0.338	1902.48	8	.
979	68 Draconis	5.7	20 9 57	+61 46 33.14	+10.767	+0.120	1905.00	7	.
980	30 Cygni	5.0	20 10 9	+46 30 46.22	+10.783	+0.227	1903.05	3	.
981	o ¹ Cygni	4.0	20 10 29	+46 26 16.44	+10.807	+0.228	1903.39	4	.
982	33 Cygni	4.3	20 11 4	+56 15 42.65	+10.850	+0.167	1904.59	5	.
983	α ¹ Capricorni	4.6	20 12 6	-12 49 2.51	+10.926	+0.402	1905.58	4	.
984	4 Capricorni	6.0	20 12 9	-22 7 7.83	+10.929	+0.427	1904.64	9	.
985	κ Cephei	4.4	20 12 16	+77 24 37.67	+10.938	-0.242	1904.94	6	7
986	24 Vulpeculæ	5.4	20 12 30	+24 21 46.15	+10.955	+0.309	1904.74	2	.
987	α ² Capricorni	3.8	20 12 30	-12 51 17.53	+10.956	+0.403	1900.35	7	.
988	Groombridge 3212	6.6	20 14 0	+84 22 37.78	+11.064	-1.009	1903.86	2	3
989	β Capricorni	3.2	20 15 24	-15 5 49.94	+11.166	+0.404	1905.54	4	.
990	176 B. Cygni	6.1	20 16 38	+39 5 15.99	+11.256	+0.258	1903.10	3	.
991	r Cygni	2.3	20 18 38	+39 56 11.34	+11.401	+0.253	1900.07	9	.
992	296 G. Sagittarii	6.0	20 19 20	-28 59 15.69	+11.450	+0.436	1904.59	9	.
993	π Capricorni	5.2	20 21 36	-18 32 22.75	+11.613	+0.404	1905.65	4	.
994	ρ Capricorni	5.0	20 23 9	-18 8 39.93	+11.724	+0.400	1905.69	4	.
995	40 Cygni	5.4	20 23 52	+38 6 42.14	+11.774	+0.257	1901.69	5	.
996	69 Aquilæ	5.1	20 24 25	- 3 13 5.00	+11.813	+0.365	1903.27	10	.
997	Groombridge 3260	7.2	20 24 28	+84 13 42.09	+11.816	-0.901	1903.86	3	3
998	41 Cygni	4.1	20 25 19	+30 2 4.76	+11.876	+0.283	1903.63	6	.
999	42 Cygni	5.9	20 25 32	+36 7 14.68	+11.891	+0.264	1904.69	4	.
1000	ω ¹ Cygni	4.9	20 26 58	+48 36 55.43	+11.992	+0.212	1904.44	6	.
1001	θ Cephei	4.3	20 27 54	+62 39 29.28	+12.058	+0.114	1903.09	3	.
1002	e Delphini	4.0	20 28 26	+10 57 47.95	+12.095	+0.328	1899.72	12	.
1003	212 H ¹ . Draconis	6.4	20 30 27	+72 11 34.36	+12.234	-0.032	1904.94	7	6
1004	ζ Delphini	4.7	20 30 38	+14 19 45.11	+12.248	+0.319	1904.72	8	.
1005	73 Draconis	5.2	20 32 50	+74 36 43.19	+12.399	-0.090	1904.30	5	4
1006	β Delphini	3.7	20 32 52	+14 14 49.66	+12.401	+0.318	1904.67	2	.
1007	29 Vulpeculæ	4.8	20 34 3	+20 51 0.09	+12.483	+0.300	1905.28	5	.
1008	13 G. Microscopii	5.5	20 34 4	-33 47 7.81	+12.483	+0.426	1905.30	5	.
1009	κ Delphini	5.2	20 34 16	+ 9 44 2.29	+12.498	+0.329	1905.75	4	.
1010	v Capricorni	5.3	20 34 21	-18 29 27.57	+12.504	+0.384	1904.46	2	.
1011	75 Draconis	5.6	20 34 32	+81 4 49.57	+12.515	-0.410	1903.85	4	3
1012	α Delphini	3.9	20 35 0	+15 33 32.37	+12.547	+0.312	1904.39	2	.
1013	α Cygni	1.3	20 38 1	+44 55 22.71	+12.753	+0.224	1899.32	137	.
1014	δ Delphini	4.5	20 38 47	+14 42 56.29	+12.805	+0.309	1905.77	4	.
1015	ψ Capricorni	4.3	20 40 11	-25 37 49.73	+12.898	+0.391	1905.79	4	.

962. Double, 4^m 0-7^m. 6, 3'', 0°; assumed that brighter star was observed, see page IX.966. Double, 4^m. 8-7^m. 5, 3'', 5, 180°; assumed that brighter star was observed, see page IX.

No.	Name.	Mag.	Approx. Right Ascension 1900.0	Declination 1900.0	Annual Preces- sion.	Secular Variation.	Mean Date.	No. Obs.	
								Above Pole.	Below Pole.
1016	γ Delphini.....	4.5	<i>h m s</i> 20 42 1	<i>° ' "</i> +15 45 49.05	" +13.021	" +0.303	1905.82	4	.
1017	ϵ Cygni.....	2.6	20 42 10	+33 35 46.29	+13.030	+0.267	1904.84	2	.
1018	δ Aquarii.....	3.8	20 42 16	-9 51 42.34	+13.037	+0.355	1904.82	2	.
1019	3 Aquarii.....	4.6	20 42 28	-5 23 37.97	+13.050	+0.345	1903.99	7	.
1020	6 H. Cephei.....	4.6	20 42 52	+57 13 13.38	+13.077	+0.158	1904.74	2	.
1021	η Cephei.....	3.6	20 43 15	+61 27 5.71	+13.103	+0.131	1904.83	2	.
1022	λ Cygni.....	4.5	20 43 31	+36 7 23.38	+13.120	+0.252	1905.75	4	.
1023	ω Capricorni.....	4.2	20 45 51	-27 17 35.70	+13.274	+0.386	1904.62	9	.
1024	μ Aquarii.....	4.8	20 47 16	-9 21 30.95	+13.366	+0.346	1903.59	6	.
1025	19 Capricorni.....	5.9	20 49 9	-18 18 7.50	+13.488	+0.360	1904.03	8	.
1026	76 Draconis.....	5.7	20 49 51	+82 9 40.28	+13.533	-0.442	1903.88	8	9
1027	32 Vulpeculae.....	5.2	20 50 18	+27 40 37.66	+13.563	+0.269	1904.47	5	.
1028	7 Aquarii.....	5.7	20 51 30	-10 4 50.94	+13.640	+0.343	1903.28	4	.
1029	220 H ¹ . Draconis.....	5.6	20 52 8	+80 10 38.30	+13.680	-0.282	1902.25	5	3
1030	ν Cygni.....	4.0	20 53 27	+40 46 54.81	+13.764	+0.231	1903.37	6	.
1031	γ Microscopii.....	4.7	20 55 10	-32 38 54.88	+13.873	+0.382	1905.09	6	.
1032	β^1 Cygni.....	4.9	20 56 26	+47 7 49.58	+13.952	+0.208	1903.22	4	.
1033	η Capricorni.....	4.9	20 58 43	-20 15 1.60	+14.096	+0.348	1904.71	8	.
1034	θ Capricorni.....	4.2	21 1 20	-17 37 49.06	+14.196	+0.342	1904.76	8	.
1035	A Capricorni.....	4.6	21 1 17	-25 24 20.16	+14.254	+0.354	1904.13	6	.
1036	ϵ Cygni.....	3.9	21 1 18	+43 31 43.66	+14.255	+0.218	1903.14	3	.
1037	61 Cygni (1st star).....	5.6	21 2 25	+38 15 39.41	+14.324	+0.297	1903.81	6	.
1038	β^2 Cygni.....	4.9	21 3 10	+47 14 47.41	+14.369	+0.205	1902.28	4	.
1039	μ Aquarii.....	4.5	21 4 9	-11 46 36.53	+14.429	+0.326	1902.90	3	.
1040	γ Equulei.....	4.8	21 5 29	+9 43 43.05	+14.510	+0.288	1903.43	5	.
1041	3 Piscis Australis.....	5.6	21 7 22	-28 1 38.82	+14.623	+0.350	1905.13	6	.
1042	98 B. Cephei.....	5.9	21 7 30	+77 43 15.65	+14.632	-0.116	1904.07	6	7
1043	ζ Cygni.....	3.4	21 8 41	+29 49 0.33	+14.702	+0.247	1900.84	6	.
1044	G Cephei.....	5.6	21 9 16	+59 34 31.05	+14.736	+0.145	1905.71	4	.
1045	τ Cygni.....	3.8	21 10 48	+37 37 7.95	+14.827	+0.230	1902.83	3	.
1046	α Equulei.....	4.1	21 10 50	+4 50 2.48	+14.829	+0.288	1903.78	6	.
1047	δ Piscis Australis.....	4.8	21 11 53	-32 35 25.41	+14.890	+0.350	1904.65	9	.
1048	4 Cygni.....	4.3	21 13 29	+38 58 31.83	+14.984	+0.222	1906.02	5	.
1049	ν Cygni.....	4.4	21 13 48	+34 28 37.10	+15.003	+0.232	1903.80	6	.
1050	α Cephei.....	2.6	21 16 12	+62 9 42.81	+15.141	+0.133	1902.11	4	.
1051	ϵ Capricorni.....	4.3	21 16 41	-17 15 37.24	+15.168	+0.313	1904.07	7	.
1052	I Pegasi.....	4.2	21 17 28	+10 22 35.55	+15.213	+0.258	1903.17	3	.
1053	B. A. C. 7504.....	7.4	21 19 35	+86 37 25.12	+15.333	-1.083	1903.07	7	6
1054	ζ Capricorni.....	3.9	21 20 58	-22 50 40.05	+15.411	+0.314	1902.81	3	.
1055	69 Cygni.....	5.8	21 21 42	+36 14 7.29	+15.452	+0.221	1904.57	5	.
1056	b Capricorni.....	4.6	21 23 1	-22 14 33.22	+15.525	+0.310	1904.66	9	.
1057	g Cygni.....	5.3	21 25 46	+46 5 50.20	+15.676	+0.195	1905.80	4	.
1058	β Aquarii.....	3.1	21 26 18	-6 0 40.13	+15.705	+0.280	1901.83	4	.
1059	β Cephei.....	3.3	21 27 22	+70 7 18.01	+15.763	+0.065	1903.61	6	4
1060	358 B. Cygni.....	6.2	21 28 6	+52 10 41.98	+15.802	+0.174	1904.26	9	.
1061	ρ Cygni.....	4.2	21 30 13	+45 8 58.80	+15.916	+0.193	1903.18	3	.
1062	72 Cygni.....	5.0	21 30 41	+38 5 9.24	+15.941	+0.210	1904.83	2	.
1063	ϵ Aquarii.....	4.8	21 32 26	-8 18 9.60	+16.033	+0.274	1904.78	6	.
1064	74 Cygni.....	5.1	21 32 56	+39 57 50.82	+16.060	+0.201	1902.29	4	.
1065	γ Capricorni.....	3.8	21 34 33	-17 6 51.04	+16.143	+0.282	1904.46	2	.
1066	13 H. Cephei.....	5.6	21 35 51	+57 2 11.90	+16.211	+0.152	1905.77	4	.
1067	41 Capricorni.....	5.3	21 36 10	-23 42 54.51	+16.235	+0.286	1904.08	7	.
1068	κ Capricorni.....	4.8	21 37 5	-10 10 10.51	+16.273	+0.280	1906.13	4	.
1069	ϵ Piscis Australis.....	4.4	21 38 59	-33 28 55.82	+16.371	+0.204	1904.73	9	.
1070	ϵ Pegasi.....	2.5	21 39 16	+9 24 50.10	+16.385	+0.241	1904.92	2	.
1071	κ Pegasi.....	4.3	21 40 7	+25 11 6.98	+16.427	+0.220	1904.61	5	.
1072	11 Cephei.....	4.8	21 40 27	+70 51 3.35	+16.444	+0.069	1903.68	7	3
1073	λ Capricorni.....	5.4	21 41 9	-11 49 37.49	+16.179	+0.261	1904.84	4	.
1074	δ Capricorni.....	5.0	21 41 31	-16 34 52.57	+16.497	+0.269	1905.93	2	.
1075	ν Cephei.....	4.5	21 42 34	+60 39 32.80	+16.549	+0.135	1904.30	9	.
1076	π^2 Cygni.....	4.3	21 43 6	+48 50 48.34	+16.575	+0.174	1905.90	4	.
1077	14 Pegasi.....	5.0	21 45 25	+29 42 30.30	+16.689	+0.207	1905.78	4	.
1078	μ Capricorni.....	5.2	21 47 51	-14 1 20.63	+16.805	+0.255	1904.39	5	.
1079	16 Pegasi.....	5.0	21 48 31	+25 27 16.19	+16.837	+0.209	1904.29	5	.
1080	Bradley 2868.....	6.9	21 49 45	+55 44 27.64	+16.895	+0.151	1903.49	6	.

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1081	13 Cephei.....	6.0	21 51 32	+56 8 15.69	+16.979	+0.149	1903.53	7	..
1082	158 B. Cephei.....	6.6	21 51 37	+73 13 45.34	+16.983	+0.050	1903.59	6	4
1083	134 G. Capricorni.....	6.2	21 53 9	-21 39 36.75	+17.054	+0.250	1904.25	5	..
1084	η Piscis Australis.....	5.4	21 55 6	-28 56 0.28	+17.142	+0.254	1905.45	5	..
1085	28 Aquarii.....	5.8	21 55 58	+0 7 28.54	+17.182	+0.224	1904.71	6	..
1086	20 Pegasi.....	5.7	21 56 13	+12 38 26.55	+17.193	+0.212	1904.67	5	..
1087	16 Cephei.....	5.2	21 57 49	+72 42 13.49	+17.265	+0.056	1905.36	4	8
1088	0 Aquarii.....	4.7	21 58 9	-2 38 17.61	+17.279	+0.222	1905.42	5	..
1089	ν Pegasi.....	4.9	22 0 38	+4 34 11.75	+17.389	+0.213	1903.84	7	..
1090	α Aquarii.....	3.2	22 0 39	-0 48 20.53	+17.389	+0.216	1901.87	9	..
1091	ι Aquarii.....	4.4	22 1 2	-14 21 17.27	+17.406	+0.227	1904.80	2	..
1092	20 Cephei.....	5.4	22 1 58	+62 17 51.60	+17.446	+0.124	1904.81	2	..
1093	ι Pegasi.....	4.0	22 2 21	+24 51 23.77	+17.463	+0.194	1905.83	4	..
1094	μ Piscis Australis.....	4.6	22 2 33	-33 28 35.67	+17.472	+0.244	1904.37	4	..
1095	27 Pegasi.....	5.6	22 4 48	+32 41 1.22	+17.567	+0.179	1904.89	2	..
1096	θ Pegasi.....	3.7	22 5 9	+5 42 20.68	+17.582	+0.206	1904.95	2	..
1097	π Pegasi.....	4.4	22 5 33	+32 41 14.79	+17.598	+0.178	1902.90	3	..
1098	28 Pegasi.....	6.4	22 5 47	+20 29 11.66	+17.608	+0.190	1904.73	9	..
1099	ζ Cephei.....	3.6	22 7 23	+57 42 29.25	+17.675	+0.136	1902.90	3	..
1100	24 Cephei.....	5.0	22 7 53	+71 50 54.75	+17.696	+0.072	1904.82	7	10
1101	λ Cephei.....	5.2	22 8 7	+58 55 15.99	+17.705	+0.132	1905.41	5	..
1102	λ Piscis Australis.....	5.4	22 8 39	-28 15 45.30	+17.727	+0.225	1905.81	4	..
1103	1 H. Lacertæ.....	4.6	22 9 35	+39 13 7.85	+17.765	+0.168	1906.39	4	..
1104	θ Aquarii.....	4.3	22 11 33	-8 16 52.32	+17.844	+0.203	1902.74	9	..
1105	ρ Aquarii.....	5.4	22 14 56	-8 19 23.55	+17.977	+0.196	1904.11	7	..
1106	47 Aquarii.....	5.4	22 16 5	-22 5 57.95	+18.021	+0.204	1904.22	5	..
1107	γ Aquarii.....	4.0	22 16 29	-1 53 28.33	+18.037	+0.190	1901.82	4	..
1108	31 Pegasi.....	4.9	22 16 36	+11 42 4.71	+18.041	+0.180	1903.35	4	..
1109	32 Pegasi.....	4.9	22 16 42	+27 49 36.98	+18.045	+0.168	1904.91	2	..
1110	2 Lacertæ.....	4.7	22 16 54	+46 1 58.68	+18.052	+0.149	1905.74	4	..
1111	3 Lacertæ.....	4.6	22 19 38	+51 43 39.74	+18.155	+0.138	1905.81	4	..
1112	π Aquarii.....	4.6	22 20 10	+0 52 11.12	+18.175	+0.181	1904.88	5	..
1113	32 H. Cephei.....	5.4	22 21 18	+85 36 17.68	+18.216	-0.256	1905.15	6	6
1114	ζ Aquarii * (mean).....	3.8	22 23 41	-0 31 53.73	+18.302	+0.177	1905.24	3	..
1115	σ Aquarii.....	4.9	22 25 21	-11 11 22.81	+18.362	+0.178	1905.90	4	..
1116	38 Pegasi.....	5.5	22 25 27	+32 3 38.39	+18.365	+0.152	1906.41	4	..
1117	δ Cephei.....	3.7-4.6	22 25 27	+57 54 12.13	+18.365	+0.122	1904.88	2	..
1118	β Piscis Australis.....	4.4	22 25 49	-32 51 32.28	+18.378	+0.192	1904.31	4	..
1119	7 Lacertæ.....	3.8	22 27 10	+49 46 6.15	+18.425	+0.135	1903.66	7	..
1120	ν Aquarii.....	5.3	22 29 13	-21 13 13.93	+18.495	+0.178	1904.71	9	..
1121	η Aquarii.....	4.1	22 30 13	-0 37 58.95	+18.528	+0.164	1901.24	5	..
1122	226 B. Cephei.....	5.7	22 30 31	+75 42 39.58	+18.538	+0.051	1902.86	5	4
1123	κ Aquarii.....	5.3	22 32 35	-4 44 37.73	+18.606	+0.160	1904.23	5	..
1124	49 G. Piscis Australis.....	5.6	22 33 13	-33 36 5.87	+18.626	+0.175	1905.68	5	..
1125	31 Cephei.....	5.2	22 33 18	+73 7 26.55	+18.630	+0.074	1904.96	2	2
1126	10 Lacertæ.....	4.9	22 34 46	+38 31 46.91	+18.677	+0.134	1904.94	2	..
1127	30 Cephei.....	5.2	22 35 6	+63 3 52.71	+18.687	+0.104	1904.67	5	..
1128	ε Piscis Australis.....	4.2	22 35 8	-27 33 53.83	+18.688	+0.168	1905.89	5	..
1129	ζ Pegasi.....	3.6	22 36 28	+10 18 33.68	+18.730	+0.148	1902.94	3	..
1130	67 Aquarii.....	6.3	22 38 1	-7 29 11.20	+18.778	+0.152	1904.18	6	..
1131	η Pegasi.....	3.1	22 38 19	+29 41 53.11	+18.787	+0.135	1905.94	2	..
1132	13 Lacertæ.....	5.2	22 39 38	+41 17 39.74	+18.827	+0.125	1905.85	4	..
1133	λ Pegasi.....	4.1	22 41 43	+23 2 21.66	+18.889	+0.133	1901.85	4	..
1134	τ Aquarii.....	4.2	22 44 18	-14 7 13.37	+18.963	+0.143	1905.83	4	..
1135	μ Pegasi.....	3.7	22 45 11	+24 4 24.21	+18.988	+0.128	1904.65	2	..
1136	ι Cephei.....	3.7	22 46 7	+65 40 28.10	+19.014	+0.090	1903.53	7	4
1137	γ Piscis Australis.....	4.5	22 46 58	-33 24 20.92	+19.038	+0.145	1904.97	9	..
1138	λ Aquarii.....	3.8	22 47 24	-8 6 41.28	+19.049	+0.134	1904.50	5	..
1139	δ Aquarii.....	3.5	22 49 21	-16 21 8.66	+19.102	+0.133	1906.41	4	..
1140	94 H ¹ . Aquarii.....	5.9	22 50 0	-5 31 14.11	+19.119	+0.128	1904.74	9	..
1141	α Piscis Australis.....	1.3	22 52 8	-30 9 9.08	+19.174	+0.134	1904.74	2	..
1142	52 Pegasi.....	5.8	22 54 12	+11 11 39.19	+19.226	+0.116	1905.16	6	..
1143	36 H. Cephei.....	5.0	22 55 13	+83 48 40.06	+19.251	-0.018	1905.13	4	9
1144	0 Andromedæ.....	3.6	22 57 19	+41 47 18.59	+19.302	+0.100	1903.25	3	..
1145	β Piscium.....	4.6	22 58 47	+3 16 54.12	+19.336	+0.109	1904.83	8	..

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1146	β Pegasi.....	2.6	22 58 56	+27 32 25.15	+19.339	+0.104	1903.92	3	.
1147	3 Andromedæ.....	4.9	22 59 41	+49 30 30.04	+19.357	+0.094	1904.86	2	.
1148	α Pegasi.....	2.6	22 59 47	+14 40 1.37	+19.359	+0.105	1900.30	8	.
1149	c^1 Aquarii.....	4.8	23 1 19	-24 16 59.49	+19.393	+0.111	1905.02	7	.
1150	55 Pegasi.....	4.7	23 1 58	+8 52 9.30	+19.408	+0.102	1905.90	5	.
1151	5 Andromedæ.....	5.8	23 3 13	+48 45 4.55	+19.434	+0.089	1905.90	4	.
1152	A Piscium.....	5.6	23 3 34	+1 35 1.11	+19.442	+0.101	1905.87	4	.
1153	c^2 Aquarii.....	3.8	23 4 7	-21 42 54.82	+19.454	+0.105	1905.95	2	.
1154	π Cephei.....	4.6	23 4 43	+74 50 48.74	+19.466	+0.058	1905.14	4	9
1155	59 Pegasi.....	5.2	23 6 41	+8 10 37.59	+19.507	+0.094	1905.89	4	.
1156	5 H ¹ . Cassiopeia.....	5.6	23 8 28	+56 36 59.98	+19.542	+0.090	1904.59	5	.
1157	ϕ Aquarii.....	4.4	23 9 9	-6 35 17.62	+19.555	+0.092	1900.86	6	.
1158	ϕ^1 Aquarii.....	4.5	23 10 39	-9 37 57.19	+19.584	+0.090	1904.99	7	.
1159	γ Piscium.....	3.8	23 11 59	+2 44 9.13	+19.608	+0.088	1903.89	3	.
1160	γ Sculptoris.....	4.5	23 13 25	-33 4 36.33	+19.634	+0.087	1904.60	3	.
1161	ζ^1 Aquarii.....	5.2	23 13 46	-10 9 26.76	+19.640	+0.083	1905.42	4	.
1162	σ Cephei.....	4.9	23 14 31	+67 33 51.93	+19.653	+0.062	1903.54	7	4
1163	ι Andromedæ.....	6.0	23 15 7	+41 31 49.51	+19.664	+0.072	1903.22	3	.
1164	τ Pegasi.....	4.6	23 15 41	+23 11 34.30	+19.673	+0.075	1903.55	6	.
1165	11 G. Sculptoris.....	5.8	23 15 56	-27 32 3.12	+19.677	+0.081	1906.15	4	.
1166	b^1 Aquarii.....	4.2	23 17 43	-20 38 47.91	+19.707	+0.076	1905.07	4	.
1167	ν Pegasi.....	4.6	23 20 23	+22 51 12.70	+19.748	+0.067	1905.85	4	.
1168	4 Cassiopeia.....	5.2	23 20 24	+61 44 1.72	+19.748	+0.058	1905.84	4	.
1169	κ Piscium.....	4.9	23 21 48	+0 42 28.63	+19.769	+0.066	1905.87	4	.
1170	θ Piscium.....	4.4	23 22 54	+5 49 46.80	+19.785	+0.063	1901.23	6	.
1171	70 Pegasi.....	4.7	23 24 6	+12 12 32.25	+19.801	+0.061	1904.94	2	.
1172	1 H. Cassiopeia.....	4.9	23 25 25	+57 59 50.50	+19.819	+0.052	1903.88	6	.
1173	39 H. Cephei.....	5.6	23 27 48	+86 45 21.68	+19.849	-0.011	1904.07	3	8
1174	δ^1 Aquarii.....	4.8	23 28 3	-21 28 1.60	+19.852	+0.055	1905.41	5	.
1175	72 Pegasi.....	5.2	23 28 59	+30 46 24.27	+19.864	+0.050	1904.69	5	.
1176	14 Piscium.....	6.0	23 29 1	-1 47 59.66	+19.864	+0.052	1905.94	2	.
1177	15 Andromedæ.....	5.5	23 29 44	+39 41 6.39	+19.872	+0.048	1904.06	2	.
1178	248 G. Aquarii.....	6.5	23 30 23	-8 1 4.11	+19.880	+0.050	1905.84	4	.
1179	λ Andromedæ.....	4.0	23 32 40	+45 54 57.62	+19.904	+0.042	1904.85	6	.
1180	ϵ Andromedæ.....	4.3	23 33 14	+42 42 52.13	+19.910	+0.041	1904.87	2	.
1181	ϵ Piscium.....	4.3	23 34 48	+5 5 2.33	+19.926	+0.041	1901.71	5	.
1182	γ Cephei.....	3.4	23 35 14	+77 4 27.66	+19.930	+0.029	1902.56	6	7
1183	μ Sculptoris.....	5.3	23 35 23	-32 37 33.59	+19.931	+0.041	1905.87	5	.
1184	κ Andromedæ.....	4.3	23 35 29	+43 46 48.84	+19.932	+0.038	1903.94	3	.
1185	λ Piscium.....	4.6	23 36 57	+1 13 46.38	+19.946	+0.036	1904.89	7	.
1186	ω^2 Aquarii.....	4.6	23 37 32	-15 5 51.67	+19.951	+0.036	1904.88	2	.
1187	i^1 Aquarii.....	5.3	23 39 1	-18 49 54.51	+19.963	+0.033	1906.13	5	.
1188	ϕ Andromedæ.....	5.1	23 41 5	+45 51 54.43	+19.978	+0.027	1904.60	5	.
1189	19 Piscium.....	5.3	23 41 17	+2 55 55.43	+19.980	+0.028	1905.19	6	.
1190	41 H. Cephei.....	5.0	23 43 8	+67 15 4.49	+19.992	+0.022	1904.94	2	2
1191	δ Sculptoris.....	4.6	23 43 43	-28 41 0.62	+19.996	+0.024	1905.94	2	.
1192	ϕ Pegasi.....	5.2	23 47 24	+18 33 54.01	+20.016	+0.016	1903.61	3	.
1193	25 Piscium.....	6.2	23 47 57	+1 32 4.61	+20.019	+0.015	1904.54	3	.
1194	274 G. Aquarii.....	6.2	23 48 11	-24 47 7.40	+20.020	+0.015	1905.91	4	.
1195	ρ Cassiopeia.....	4.8	23 49 23	+56 56 35.75	+20.025	+0.012	1904.93	2	.
1196	Groombridge 4163.....	6.6	23 49 58	+73 51 13.67	+20.028	+0.010	1902.65	7	8
1197	ϕ Pegasi.....	4.8	23 52 41	+24 35 8.22	+20.037	+0.006	1905.81	4	.
1198	27 Piscium.....	5.1	23 53 33	-4 6 39.03	+20.039	+0.004	1906.43	4	.
1199	ω Piscium.....	4.0	23 54 11	+6 18 34.57	+20.040	+0.003	1902.66	8	.
1200	30 Piscium.....	4.7	23 56 50	-6 34 10.47	+20.045	-0.002	1903.91	4	.
1201	2 Ceti.....	4.6	23 58 37	-17 53 32.65	+20.046	-0.006	1905.24	3	.

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